

**B. To the Claims**

*Applicants request that the Examiner enter the amendments to the claims set forth below. Claims 1, 5-7, 9-14, 16-19, 21-30, 32-44, 51, 60, 63-65, 68, 74-79, 82, 88-106, 128, 144, 152-153, 155-162, 164-177, 185, 189-200, 202-204, 207-208, 210-228, 230-252, 254-260, 262-290, 292-295, 299, 320-321, 323, 325, 329, 338-339, 341-342, 345, 349, 352, 383, 386-391, 394-396 & 399 are amended. For the PTO's convenience, claims that remain unchanged are included below in order to allow the Examiner to review all pending claims from this response in their numerical order.*

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1. (Amended) A method of distributing data units, said data units comprising an information portion and an identification portion, said identification portion identifying at least one characteristic of said data units, said method comprising the steps of:
    - receiving a plurality of said data units on a multiple channel data stream, at least some of said data units being received sequentially; and
    - performing the following steps for each of said received data units:
      - (a) storing the received data units in a data buffer;
      - (b) decoding the identification portion of the data units to identify the at least one characteristic of the data units;
      - (c) determining whether the data units should be distributed before or after one or more other of said data units based on the identified at least one characteristic of the data units; and
      - (d) transmitting the data units in an order relative to other of said data units based on said step of determining.

2. (Unchanged) The method of claim 1 wherein said step of determining comprises the steps of:

comparing the identification portion of the data units to predetermined information designating the order of distribution of said data units; and

determining the position of the data units in an order of distribution of the received data units based on said step of comparing the identification portion.

3. (Unchanged) The method of claim 1 wherein said step of determining comprises the steps of:

comparing the identification portion of the data units to stored schedule information designating when each of said data units is to be distributed; and

determining when the data units should be distributed based on said schedule information.

4. (Unchanged) The method of claim 1 wherein said step of transmitting comprises the steps of:

changing said transmission order of the received data units based on said step of determining;

outputting the data units to output ports in said changed transmission order to distribute the data units in an order different from the order in which they were received.

5. (Amended) A method for routing and distributing data units, each of said data units having an identification portion and an information content portion, said method using a switch with multiple data ports, a plurality of storage locations for storing and communicating each of said data units to a [unique] specific destination address and a controller for controlling said switch and said plurality of storage [location] locations, said method comprising the steps of:

receiving [the] said data units in an information stream, said stream having said data units separated in the time domain so that said data units are sequentially received by said switch;

processing said data units by decoding [the] said identification portion of each of said data units to identify [the] priority of [the] said information content portion of said data units;

routing each of said data units to a data port on said switch;

selecting a storage location to store each of said data units; and

communicating each of said data units to said selected storage location to prioritize [the] transmission of each of said data units.

6. (Amended) The method of claim 5 further comprising:

accumulating information about said identification portion of said data units to calculate the total number of data units [transmitted over a predetermined time span, said calculated total about said identification portion of said data units being maintained for each said unique destination address, decoded in said step of processing from said identification portion, for said data units] passing through said switch to each said specific destination address over [said] a predetermined time span.

7. (Amended) The method of claim 6 further comprising:

generating a bill from said total number of said data units [transmitted over a predetermined time calculated in said step of accumulating information] by comparing said [accumulated] total number of said data units [transmitted to said unique destination address] with a predetermined billing rate.

8. (Unchanged) The method of claim 5 further comprising:

determining from said decoded identification portion of said data units whether said data units should be distributed to multiple data ports on said switch.

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9. (Amended) The method of claim 5 further comprising:  
comparing said decoded identification portion of said data units with a predetermined schedule to determine a re-transmission time for said data units and determining a data port on said switch for [said] re-transmission.

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10. (Amended) The method of claim 5 further comprising:  
accumulating information about said identification portion of said data units to calculate the total number of data units [transmitted over a predetermined time span, said calculated total about said identification portion of said data units being maintained for each data port on said switch for said data units] passing through [said switch] each of said multiple data ports over said predetermined time span.

11. (Amended) The method of claim 10 further comprising:  
generating a bill from said total number of data units [transmitted over a predetermined time calculated in said step of accumulating information] by comparing said [accumulated] total number of data units [transmitted to a data port] with a predetermined billing rate.

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12. (Amended) A method for routing and distributing data units, each of said data units having an identification portion and an information content portion, said method using a switch with multiple data ports, a plurality of storage locations for storing and communicating said data units and a controller for controlling said switch and said storage location, said method comprising the steps of:

receiving [the] said data units in an information stream, said stream having said data units separated in the time domain so that said data units are sequentially received by a switch;

processing said data units by decoding [the] said identification portion of each of said data units to identify [the] said information content portion of said data units;

comparing [the] said identification portion of said data units to predetermined timing data to determine a transmission time based on said identification portion of said data units; and

transmitting said data units based on said comparing step.

13. (Amended) The method of claim 12 further comprising:

accumulating information about said identification portion of said data units to calculate the total number of data units transmitted [over a predetermined time span, said calculated total about said identification portion of said data units being maintained for each said unique destination address, decoded in said step of processing from said identification portion, for said data units] passing through [said] a switch over said predetermined time span.

14. (Amended) The method of claim 13 further comprising:

generating a bill from said total number of data units [transmitted over a predetermined time calculated in said step of accumulating information] by comparing said [accumulated] total number of data units [transmitted to said unique destination address] with a predetermined billing rate.

15. (Unchanged) The method of claim 12 further comprising:

determining from said decoded identification portion of said data units whether said data units should be distributed to multiple data ports on said switch.

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16. (Amended) The method of claim 12 further comprising:  
comparing said decoded identification portion of said data units with a  
predetermined schedule to determine a re-transmission time for said data units and  
determining a data port on said switch for [said] re-transmission.

17. (Amended) A method for routing and distributing data units, each of  
said data units having an identification portion and an information content portion, said  
method using a switch with multiple data ports, a plurality of storage locations for storing  
and communicating data units and a controller for controlling said switch and said  
plurality of storage [location] locations, said method comprising the steps of:

receiving [the] said data units in an information stream, said stream having said  
data units separated in the time domain so that said data units are sequentially received by  
[a] said switch;

processing said data units by decoding [the] said identification portion of each of  
said data units to identify [the] said information content portion of said data units;

comparing said decoded identification portion of each of said data units to  
predetermined priority data to determine a transmission priority;

communicating an instruct-to-delay signal to cause a delay in [the]  
communication of said data units.

18. (Amended) The method of claim 17 further comprising:  
accumulating information about said identification portion of said data units to  
calculate the total number of data units [transmitted over a predetermined time span, said  
calculated total about said identification portion of said data units being maintained for  
each said unique destination address, decoded in said step of processing from said

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identification portion, for said data units] passing through said switch to each of a plurality of specific destination addresses over [said] a predetermined time span.

19. (Amended) The method of claim 18 further comprising:  
generating a bill from said total number of data units [transmitted over a predetermined time calculated in said step of accumulating information] by comparing said [accumulated] total number of data units [transmitted to said unique destination address] with a predetermined billing rate.

20. (Unchanged) The method of claim 17 further comprising:  
determining from said decoded identification portion of said data units whether said data units should be distributed to multiple data ports on said switch.

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21. (Amended) The method of claim 17 further comprising:  
comparing said identification portion of said data units with a predetermined schedule to determine a re-transmission time for said data units and determining a data port on said switch for [said] re-transmission.

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22. (Amended) The method of claim 17 further comprising:  
accumulating information about said identification portion of said data units to calculate the total number of data units [transmitted over a predetermined time span, said calculated total about said identification portion of said data units being maintained for each data port on said switch for said data units] passing through [said switch] each of said multiple data ports over [said] a predetermined time span.

23. (Amended) The method of claim 22 further comprising:

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generating a bill from said total number of data units [transmitted over a predetermined time calculated in said step of accumulating information] by comparing said [accumulated] total number of data units [transmitted to a data port] with a predetermined billing rate.

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24. (Amended) A method for routing and distributing data units, said data units having a first identification portion and a second multimedia information portion using a switch with multiple data ports, a data buffer and a controller for controlling said switch comprising the steps of:

receiving [the] said data units from a multiple channel data stream, said multiple channel data stream having said data units separated in the time domain so that said data units are sequentially received on a data port on said switch;

processing said data units by decoding said first portion of said data units to identify [the] a type of data in said second multimedia information portion and to identify a [unique] specific destination address that indicates routing information for said data units;

assigning a transmission priority to said data units based on said type of data in said second multimedia portion of said data units determined by said step of processing said data units by placing said data units into said data buffer and;

transmitting said data units based on said assigned priority determined by the type of data in said second multimedia information portion of said data units to a data port on said switch.

25. (Amended) The method of claim 24 further comprising:  
accumulating information about said identification portion of said data units to calculate the total number of data units [transmitted over a predetermined time span, said calculated total about said identification portion of said data units being maintained for



each said unique destination address, decoded in said step of processing from said identification portion, for said data units] passing through said switch over [said] a predetermined time span.

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26. (Amended) The method of claim 25 further comprising:  
generating a bill from said total number of data units [transmitted over a predetermined time calculated in said step of accumulating information] by comparing said [accumulated] total number of data units [transmitted to said unique destination address] with a predetermined billing rate.

27. (Amended) The method of claim 24 further comprising:  
determining from said decoded [identification] first portion of said data units whether said data units should be distributed to multiple data ports on said switch.

28. (Amended) The method of claim 24 further comprising:  
comparing said [identification] first portion of said data units with a predetermined schedule to determine a re-transmission time for said data units and determining a data port on said switch for [said] re-transmission.

29. (Amended) The method of claim 24 further comprising:  
comparing said [identification] first portion of said data units with a predetermined schedule to determine a re-transmission time for said data units and determining multiple data ports on said switch for [said] re-transmission.

30. (Amended) The method of claim 28 further comprising:  
verifying said re-transmission by receiving said re-transmitted data units from said [selected] determined data port on said switch and repeating said step of processing

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~~said data units to identify the type of data in said second multimedia information portion  
and to identify an address that indicated routing information for said data units.~~

31. (Unchanged) The method of claim 28 further comprising:  
receiving a new transmission schedule and changing said predetermined  
transmission schedule.

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32. (Amended) The method of claim 24 further comprising:  
receiving a billing rate [schedule] .

33. (Amended) A method for routing and distributing multimedia data, said  
multimedia data having a first identification portion and a second multimedia information  
portion using a network of switches each with multiple ports and a controller for  
controlling said network of switches comprising the steps of:

receiving [the] said multimedia data at an input on a first switch, said multimedia  
data having multimedia signal units separated in the time domain so that said multimedia  
data is sequentially received;

processing said multimedia data units by decoding a first encoded portion of said  
multimedia data units to determine a destination address for said multimedia data units;

routing said multimedia data units to an output port on said network of switches  
based on said processing step;

storing said multimedia data units in a temporary storage location based on said  
routing step that was determined in said processing step;

transmitting said multimedia data units from said temporary storage [device]  
location at an asynchronous time, said asynchronous time determined by decoding said  
first encoded portion of said multimedia data units to determine [the] a type of data in  
said second multimedia information portion to a second switch.

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34. (Amended) The method of claim 33 further comprising:  
determining from said decoded [identification] first encoded portion of said data  
units whether said data units should be distributed to multiple data ports [on said switch]  
in said network of switches.

35. (Amended) The method of claim 33 further comprising:  
comparing said decoded [identification] first encoded portion of said data units  
with a predetermined schedule to determine a re-transmission time for said data units and  
determining a data port [on said switch] in said network of switches for said re-  
transmission.

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36. (Amended) The method of claim 33 further comprising:  
accumulating information about said identification portion of said data units to  
calculate the total number of data units [transmitted over a predetermined time span, said  
calculated total about said identification portion of said data units being maintained for  
each data port on said switch for said data units] passing through [said switch] each of  
said multiple ports over [said] a predetermined time span.

37. (Amended) The method of claim 36 further comprising:  
generating a bill from said total number of data units [transmitted over a  
predetermined time calculated in said step of accumulating information] by comparing  
said [accumulated] total number of data units [transmitted to a data port] with a  
predetermined billing rate.

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38. (Amended) A method for coding, decoding, routing and distributing  
multimedia data, said multimedia data having a first identification portion and a second

multimedia information portion using a multiple port switch and a controller comprising the steps of:

receiving multimedia data units from a multiple channel data stream, said multiple channel data stream having multimedia data units separated in the time domain so that said multimedia data units have an asynchronous arrival at a data port on said switch;

processing said multimedia data units by decoding said first portion [of said multimedia data units] to identify [the] a type of data in said second multimedia information portion and to identify a [unique] specific destination address that indicates routing information for said multimedia data units;

storing said multimedia signal in a temporary storage location based on said routing information determined in said processing step;

processing said multimedia data units by decoding said second multimedia information portion of said multimedia data units and re-formatting said multimedia data units from said second multimedia information portion of said multimedia data units;

re-timing said re-formatted multimedia data units into a synchronous data stream.

39. (Amended) The method of claim 38 further comprising:

transmitting said re-timed and re-formatted multimedia [signal] data units from said temporary storage location in a synchronous data stream, [said] a synchronizing time determined by [the] a data port on said switch selected by said address decoded from said first portion of said multimedia data units [in said step of processing] .

40. (Amended) The method of claim 38 further comprising:

transmitting said re-timed and re-formatted multimedia [signal] data units from said temporary storage location in a synchronous data stream, [said] a synchronizing time determined by comparing said decoded [multimedia identification] first portion of said

multimedia data units with predetermined data [to determine a re-transmission rate for said multimedia signal] .

41. (Amended) The method of claim 38 further comprising:  
accumulating information from said first [identification] portion of said multimedia data units to calculate the total number of multimedia data units [transmitted over a predetermined time span, said calculated total about said identification portion of said multimedia data units being maintained for each said unique destination address, decoded in said step of processing from said identification portion, for said multimedia data units] passing through said switch to each specific destination address over [said] a predetermined time span.

42. (Amended) The method of claim 41 further comprising:  
generating a bill from said total number of data units [transmitted over a predetermined time calculated in said step of accumulating information] by comparing said [accumulated] total number of data units [transmitted to said unique destination address] with a predetermined billing rate.

43. (Amended) The method of claim 38 further comprising:  
determining from said decoded [identification] first portion of said multimedia data units whether said multimedia data units should be distributed to multiple data ports on said switch.

44. (Amended) The method of claim 38 further comprising:  
comparing said decoded [identification] first portion of said multimedia data units with a predetermined schedule to determine a re-transmission time for said multimedia data units and determining a data port on said switch for [said] re-transmission.

45. (Unchanged) The method of claim 38 wherein said multimedia information is analog audio.

46. (Unchanged) The method of claim 38 wherein said multimedia information is digital audio.

47. (Unchanged) The method of claim 38 wherein said multimedia information is analog video.

48. (Unchanged) The method of claim 38 wherein said multimedia information is digital video.

49. (Unchanged) The method of claim 38 wherein said multimedia information is analog data.

50. (Unchanged) The method of claim 38 wherein said multimedia information is digital data.

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51. (Amended) A method of processing signals at a receiver station, said receiver station having a computer capable of responding to commands and controlling [the] communication of signals, said method comprising the steps of:

inputting and storing a command, said command designating at least one of:

(1) a signal to be stored, said signal including at least one of television, radio, video, audio, data, and computer programming;

(2) a time to communicate [said] a signal; and

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(3) a place to communicate [said] a signal to or from, said place including at least one of a transmitter, video monitor, a speaker, a computer, a processor, a controller, a storage device, and a subscriber station;

receiving said signal;

storing said signal at a first storage location, said first storage location being capable of being commanded to store and output said signal; and

outputting said signal from said first storage location to a second storage location in accordance with said command;

storing said signal at said second storage location, said second storage location being capable of being commanded to store and output said signal; and

communicating said signal from said second storage location.

52. (Unchanged) A method of processing signals at a receiver station, said receiver station having a receiver for receiving a transmission, and a plurality of storage locations, each storage location capable of being commanded to store and output programming, said receiver station capable of selecting between each of said plurality of storage locations and communicating said programming between each of said plurality of storage locations, said method comprising the steps of:

receiving an information transmission including programming comprising at least one of television, radio, video, audio, data, and computer programming;

demodulating said information transmission;

detecting said programming embedded in said information transmission;

storing said programming at a first storage location;

transferring said programming stored at said first location to a second location in response to a command;

storing said programming at said second storage location to enable said receiver station to transfer said programming from said second storage location to a computer at a specific time or in response to said command.

53. (Unchanged) The method of claim 52 further comprising the steps of:  
storing programming storage information indicating that said programming is stored in said first storage location; and  
updating said programming storage information when said programming has been transferred to said second storage location.

54. (Unchanged) The method of claim 52 further comprising the step of embedding in said programming an identification signal identifying said programming, and said steps of storing including storing said programming with said embedded identification signal.

55. (Unchanged) The method of claim 54 further comprising the steps of:  
communicating said programming and said embedded identification signal from said second storage location to said output device;  
detecting said identification signal in said programming; and  
recording information indicating that said programming was communicated.

56. (Unchanged) The method of claim 52 further comprising the step of receiving and identifying a signal instructing said receiver station to communicate said programming to an output device.



57. (Unchanged) The method of claim 56 further comprising the step of communicating, in response to said signal, said programming from said second storage location to said output device.

58. (Unchanged) The method of claim 52 further comprising the steps of: receiving a programming schedule designating the time and channel for communicating said programming; and

communicating said programming from second storage location to said output device in accordance with said programming schedule.

59. (Unchanged) A method of communicating signals in a network, said network including an origination station, at least one intermediate station that receives and transmits said signals, and at least one subscriber station, said method comprising the steps of:

storing television programming at a first storage location, said television programming, including video and audio;

transferring, under computer control, said television programming from said first storage location to a second storage location at a selected one of said at least one intermediate station;

storing said television programming at said second storage location to enable said selected intermediate station to communicate said television programming from said second storage location to a selected one of said at least one subscriber station;

communicating a programming identification signal from said origination station to said selected intermediate station, said programming identification signal identifying said television programming stored at said second storage location;

detecting, at said selected intermediate station, said programming identification signal communicated from said origination station; and

communicating said television programming from said second storage location to said selected subscriber station based on said programming identification signal.

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60. (Amended) A method of communicating signals in a network, said network including an origination station, [at least one] a plurality of intermediate [station] stations that receives and retransmits said signals, and a plurality of subscriber stations that receive said signals, said method comprising the steps of:

storing television programming at a first storage location at a first intermediate station, said first intermediate station being one of said [at least one] plurality of intermediate [station] stations in said network;

transferring, under computer control, said television programming from said first storage location to a second storage location at a second intermediate station, said second intermediate station being one of said [at least one] plurality of intermediate [station] stations in said network;

storing said television programming at said second storage location to enable [the] communication of said television programming from said second intermediate station to at least one of said plurality of subscriber stations.

61. (Unchanged) The method of claim 60 further comprising the steps of:  
communicating a programming identification signal from said origination station to said first intermediate station, said programming identification signal identifying said television programming;

detecting, at one of said plurality of intermediate stations, said programming identification signal communicated from said origination station;

communicating said television programming from said second storage location to at least one of said plurality of subscriber stations in response to detecting said programming identification signal.

62. (Unchanged) The method of claim 61 further comprising the step of verifying that said television programming was communicated from said second storage location.

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63. (Amended) The method of claim 60 wherein said step of storing said television programming at second storage location further comprises the steps of:  
identifying said television programming;  
embedding identification data in said television programming, said identification data identifying said television programming;  
storing said television programming with said embedded identification data at said second storage location to enable [the] communication of said television programming from said second intermediate station to at least one of said plurality of subscriber stations.

64. (Amended) The method of claim 63 further comprising:  
detecting said embedded identification data in said television programming; and  
storing information indicating that said television programming was communicated based on said step of detecting said embedded identification data.

65. (Amended) The method of claim 60 wherein said step of storing said television programming at said first storage location further comprises storing [a] first television programming and [a] second television programming on a first storage device; and said step of storing said television programming at said second storage location further comprises:

(a) sorting said first television programming and said second television programming into a specific order; and

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(b) storing said first television programming and said second television programming on said second storage device in said specific order.

66. (Unchanged) A method of processing signals at a receiver station comprising the steps of:

- receiving one of a broadcast and cablecast transmission;
- demodulating said one of a broadcast and cablecast transmission, said one of a broadcast and cablecast transmission including an embedded signal;
- detecting said embedded signal on said one of a broadcast and cablecast transmission;
- selecting information stored at a first storage location in response to said embedded signal;
- transferring said information from said first storage location to a second storage location based on said embedded signal, thereby providing a computer access to said information; said first storage location and said second storage location being capable of being commanded to store and output programming.

67. (Unchanged) The method of claim 66, wherein said information includes one of television and radio programming, and wherein said step of selecting said information includes selecting said one of television and radio programming stored at said first storage location in response to said embedded signal; and wherein said step of transferring said information includes transferring, under computer control, said selected one of television and radio programming from said first storage location to said second storage location, and said method further comprising the step of:

- communicating, under computer control, said one of television and radio programming stored at said second storage location to an output device in response to a second embedded signal on said one of a broadcast and cablecast transmission.

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68. (Amended) A method of controlling [the] communication of television programming at a transmission station, where said television programming includes video and audio, said transmission station having at least one storage device for storing said television programming, transferring means for transferring said television programming within said transmission station from a first storage location to a second storage location, and a computer for controlling said transferring means and identifying said television programming on the basis of identification information associated with said television programming, said method comprising the steps of:

inputting schedule information that specifies said television programming, and at least one of:

- (a) a time to communicate said television programming; and
- (b) a place to communicate said television programming to;

transferring said television programming from said first storage location to said second storage location thereby enabling said transmission station to communicate said television programming from said second storage location to a receiver station in accordance with said schedule information.

69. (Unchanged) The method of claim 68, wherein said first storage location and second storage location are separate storage locations on a storage device, said step of transferring said television programming further comprising transferring location information of said television programming from said first storage location to said second storage location.

70. (Unchanged) The method of claim 68 wherein said schedule information further specifies an output channel on which to communicate said television programming.

71. (Unchanged) The method of claim 68, wherein said first storage location is at a first storage device, said second storage location is at a second storage device, and said transferring means is a matrix switch, and wherein said step of transferring further includes:

configuring said matrix switch to connect said first storage device to said second storage device, said first storage device being connected to an input to said matrix switch, and said second storage device being connected to an output of said matrix switch;

outputting said television programming stored at said first storage device to the input of said matrix switch;

inputting said television programming to said second storage device from said matrix switch; and

storing said television programming at said second storage device.

72. (Unchanged) A transmission station apparatus for communicating programming, said apparatus comprising:

a receiver for receiving an information transmission, said information transmission including said programming;

a first storage device connected to said receiver for storing said programming;

a second storage device connected to said first storage device, said second storage device storing said programming output by said first storage device;

a switch connected to said first storage device and said second storage device;

a computer connected to said first storage device, said second storage device, and said switch for controlling said first storage device to output said programming to said second storage device and controlling said second storage device to output said programming to said switch, said computer being capable of:

(1) selecting a storage device to store said programming;

(2) commanding said switch to transfer said programming to said selected storage device; and

(3) commanding said selected storage device to store said programming; and  
a cable network connected to said switch for receiving said programming output from said second storage device and communicating said programming to a plurality of subscriber stations.

73. (Unchanged) The apparatus of claim 72, further comprising:  
a signal encoder connected to said computer for encoding an identification signal on said programming;

a channel modulator connected to said switch and to said cable network, said channel modulator modulating said programming output by said second storage device through said switch, said cable network communicating said modulated programming to said subscriber; and

a verification circuit connected to at least one of said switch, said cable network, and said channel modulator for verifying at least one of the time, channel, and frequency of transmission of said programming, said verification circuit comprising a signal decoder for decoding, said encoded identification signal.

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74. (Amended) An apparatus for controlling [the] communication of television programming at a transmission station comprising:  
a first storage device for storing said television programming;  
a second storage device for storing said television programming;  
a configurable switch connecting said first storage device to said second storage device;  
a modulator connected to said second storage device for communicating said television programming to subscribers; and

a computer connected to said first storage device, said second storage device, and said configurable switch, said computer having a memory and being programmed to perform the following steps:

(a) receiving and storing a programming schedule, said programming schedule designating said television programming, a time to communicate said television programming, and one of a communication channel and frequency for communicating said television programming;

(b) controlling said first storage device to receive and store said television programming;

(c) controlling said configurable switch and said first storage device to transfer said television programming from said first storage device to said second storage device;

(d) controlling said second storage device to store said television programming; and

(e) controlling said second storage device and said modulator to communicate said television programming from said second storage device to said subscribers according to said programming schedule.

75. (Amended) A method of communicating subscriber station information from a subscriber station to at least one remote collection station, said method comprising the steps of:

[(1)] inputting an instruct signal which is effective at said subscriber station to output a signal from a first storage location and store said signal at a second storage location;

[(2)] detecting the presence of an instruction associated with said instruct signal, said instruction being effective at said subscriber station to generate subscriber



station specific data and to select and assemble said subscriber station specific data into a record;

[(3)] processing at said subscriber station inputted data and performing, in response to said instruction, one of:

- (a) generating subscriber station specific data and communicating said subscriber station specific data to a transmitter; and
- (b) selecting and assembling into said record said subscriber station specific data and communicating said record to a transmitter; and

[(4)] transmitting said record to said at least one remote collection station.

76. (Amended) A method of gathering information on the use of a signal at a receiver station, said receiver station having a processor, and a controlled device, said receiver station transferring said information to a remote station, said method comprising the steps of:

[(1)] identifying at least one of a device and a control signal which operates to output a signal from a first storage location and store said signal at a second storage location;

[(2)] monitoring said at least one of a device and a control signal;

[(3)] storing a record of the use of said at least one of a device and a control signal; and

[(4)] communicating said information from said record from said receiver station to said remote station.

77. (Amended) A method of controlling a network comprising at least one remote intermediate transmitter station and at least one receiver station, with said at least one remote intermediate transmitter station including a transmitter for transmitting data, a plurality of selective transfer devices each operatively connected to said transmitter, a

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data receiver for receiving data from at least one origination transmitter station, a control signal detector, and a computer capable of controlling said plurality of selective transfer devices, and with said at least one remote intermediate transmitter station adapted to detect a control signal, to control the communication of said data in response to said control signal, and to deliver said data to said transmitter, said method comprising the steps of:

[(1)] receiving at said at least one origination transmitter station said data to be transmitted by said at least one remote intermediate transmitter station and delivering said data to [said] at least one origination transmitter, said data comprising an instruct signal which is effective in said network to output a signal from a first storage location and store said signal at a second storage location;

[(2)] receiving said control signal which operates at said at least one remote intermediate transmitter station to control the communication of said data; and

[(3)] transmitting said control signal to said at least one origination transmitter before a specific time.

78. (Amended) A method of controlling a plurality of receiver stations each of which includes a data receiver, a signal detector, at least one computer, and with each of said plurality of receiver stations adapted to detect the presence of a control signal and to input a viewer reaction to an offer communicated in a mass medium program, said method of controlling comprising the steps of:

[(1)] receiving a first code at a transmitter station, wherein said first code designates one of a product or service offered in a mass medium program and a viewer reaction to an offer communicated in a mass medium program;

[(2)] receiving a second code at said transmitter station, wherein said second code operates at said plurality of receiver stations to output a signal from a first storage location and store said signal at a second storage location;

[(3)] transferring said first code and said second code to a transmitter at said transmitter station; and

[(4)] transmitting said first code and said second code.

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79. (Amended) A method of communicating data and update material to at least one of a plurality of receiver stations, each of which includes a data receiver, a data storage device, a control signal detector, a computer capable of processing data, with each of said plurality of receiver station adapted to detect and respond to an instruct signal and to store data for subsequent processing, said method comprising the steps of:

[(1)] receiving data to be transmitted and delivering said data to a transmitter;

[(2)] receiving an instruct signal which operates at at least one of said plurality of receiver stations to output a signal from a first storage location and store said signal at a second storage location;

[(3)] transferring said instruct signal to said transmitter; and

[(4)] transmitting an information transmission comprising said data and said instruct signal.

80. (Unchanged) An interactive method for data promotion and delivery for use with an interactive mass medium program output apparatus comprising the steps of:

outputting a mass medium program that promotes data, said interactive mass medium program output apparatus having an input device to receive input from a subscriber;

prompting said subscriber during said mass medium program whether said subscriber wants said data promoted in said step of outputting, said interactive mass medium program output apparatus having a memory for storing code;

receiving a reply from said subscriber at said input device in response to said step of prompting, said interactive mass medium program output apparatus having a processor for processing said subscriber reply and said data;

processing said reply and selecting code designating said data, said interactive mass medium program output apparatus having a transmitter for communicating information to a remote station;

communicating said selected code to said remote station, said interactive mass medium output apparatus and said remote station comprising a network having a plurality of transmitter stations;

assembling, in said network, a signal which is effective at said interactive mass medium program output apparatus to store said data at said memory, said interactive mass medium program output apparatus having a receiver for receiving at least a portion of said signal from said remote station;

delivering at least a portion of said signal at said interactive mass medium program output apparatus; and

delivering said data on the basis of said signal.

81. (Unchanged) The method of claim 80, wherein said signal is embedded in the non-visible portion of a television signal.

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82. (Amended) The method of claim 80, wherein evidence information evidencing one of the availability, use and usage of said mass medium program and said data is stored and communicated to a remote data collection station, said method further comprising the step of selecting said evidence information that identifies at least one of:

- (1) a mass medium program;
- (2) a use of data;
- (3) a transmission station;

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- (4) a receiver station;
  - (5) a network;
  - (6) a broadcast station;
  - (7) a channel on a cable system;
  - (8) a time of transmission;
  - (9) a unique identifier datum;
  - (10) a source or supplier of data;
  - (11) a distributor of advertisement; and
  - (12) an indication of [copyright] a payment obligation.

83. (Unchanged) The method of claim 80, wherein said signal incorporates executable code, said method further comprising the steps of communicating said code to said processor and performing, on the basis of said code, one of:

- (1) receiving a signal containing said data;
- (2) actuating one of a video, audio, and print storage or output device, as appropriate, to store or output said data;
- (3) decrypting at least a portion of said data;
- (4) controlling a selective transfer device to communicate said data to a storage device or an output device;
- (5) generating, a receiver specific datum on the basis of said data;
- (6) delivering a mass medium program at said interactive mass medium program output apparatus simultaneously with said data, and
- (7) delivering a mass medium program at said interactive mass medium program output apparatus sequentially with said data.

84. (Unchanged) A method of controlling a receiver station, said receiver station having a processor performing a first function, said method comprising the steps of:

- detecting one of the presence and absence of a first control signal;
- inputting an instruct-to-react signal to said processor based on said step of detecting;
- controlling said processor to perform a second function and to output information in response to said step of inputting; and
- selecting data and generating a second control signal based on said step of controlling, said second control signal being effective to communicate said selected data to a storage device on the basis of said information.

85. (Unchanged) The method of claim 84, wherein a buffer is connected to said processor for buffering input, said method further comprising the step of:

- inputting said instruct-to-react signal directly to said processor.

86. (Unchanged) The method of claim 84, wherein said processor processes a datum designating one of a television channel and a television program, said method further including one of:

- controlling a tuner to tune a receiver to receive said one of a television channel and television program;

- controlling a selective transfer device to input to a control signal detector said one of a television channel and television program;

- controlling said control signal detector to search for control signals in said one of a television channel and television program;

- controlling said selective transfer device to input to a computer said control signals detected in said one of a television channel and television program;

controlling said computer to respond to said control signals detected in said one of a television channel and television program;

controlling a television monitor to display video and audio contained in said one of a television channel and television program;

controlling a video recorder to record or play video and audio contained in said one of a television channel and television program; and

controlling said selective transfer device to communicate to one of a video recorder or a television monitor said one of a television channel and television program.

87. (Unchanged) The method of claim 84, wherein said processor processes a datum designating a specific channel of a multichannel signal, said method further including one of:

controlling a tuner to tune a converter to receive said specific channel;

controlling a selective transfer device to input a control signal detector said specific channel;

controlling said control signal detector to search for control signals in said specific channel;

controlling a selective transfer device to input to a computer said control signals detected in said specific channel;

controlling a computer to respond to said control signals detected in said specific channel;

controlling a television monitor to display video and audio contained in said specific channel;

controlling a video recorder to record or play video and audio contained in said specific channel; and

controlling a selective transfer device to communicate to at least one of a storage device and an output device said specific channel.

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88. (Amended) A method for identifying television programming in one of a broadcast and cablecast transmission station that has a storage device having (i) at least two storage locations each capable of storing a television signal, and (ii) a control device capable of controlling said storage device and identifying said television programming on the basis of identification information stored at said storage device, said method comprising the steps of:

inputting said identification information that identifies said television programming;

inputting said television [signal] programming to said storage device;

storing said television programming at a selected one of said at least two storage locations; and

storing said identification information with said television programming at said selected location; and

identifying said television programming on the basis of identification information associated in storage with said television programming.

89. (Amended) The method of claim 88 further comprising storing information that identifies [the location] said selected one of said at least two storage locations where [the unit] said television programming is stored.

90. (Amended) A method for identifying television programming in a broadcast and cablecast transmission station that has storage means having a first and a second storage location, wherein said storage means is capable of holding at least two units of said television programming, and control means capable of controlling said storage means and for identifying a selected unit of television programming on the basis



of identification information associated with said selected unit, said method comprising the steps of:

inputting identification information that specifies a unit of said television programming;

inputting said unit of said television programming associated with said inputted identification information;

identifying [the] said unit of said television programming;

storing said unit at said first storage location; and

storing said identification information at said second storage location, thereby to enable said station to identify said unit stored in the first storage location on the basis of identification information stored in said second storage location.

91. (Amended) A method for identifying and one of broadcasting and cablecasting television programming at a television transmission station, said transmission station capable of storing and transmitting a television transmission, said television transmission comprising units of television programming and identification information identifying said units of said television programming, said method comprising the steps of:

inputting schedule information that identifies one of a category and a unit of said television programming;

inputting said television transmission;

locating identification information in said transmission that identifies said one of [said] a category and [said] a unit of said television programming;

storing said television transmission at a first storage device;

determining that said identification information identifies said one of said category and [said] a unit of said television programming;

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transferring information of said television programming transmission to a second storage device; and

storing said information of said television programming at said second storage device, thereby enabling said station to broadcast and/or cablecast television programming of said one of [said] a category and [said] a unit of said television programming.

92. (Amended) The method of claim 91, wherein said television transmission comprises said unit of said television programming and unit identification information that identifies [the] said unit, said step of transferring comprising the [steps] step of:

transferring [the] said unit of programming and [the] said unit identification information of [the] said television transmission to a second storage device; and

said step of storing comprises the step of storing [the] said unit of programming with said unit identification information in [the] said second storage device, thereby enabling a computer at [the] said television transmission station to later locate and identify [the] said stored unit of programming based upon said stored identification information.

93. (Amended) The method of claim 92, said schedule information designating one of an output channel and a time for communicating said unit of said television programming, said method further comprising the steps of:

identifying [the] said unit of television programming stored in said second storage device based on unit identification information;

one of broadcasting and cablecasting [the] said unit of programming on one of the output channel and at the time designated by [the] said schedule information.

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94. (Amended) The method of claim 93, further comprising the step of detecting and identifying [the] said unit of television programming being one of cablecast and broadcast by detecting and identifying [the] said unit identification information in [the] said television transmission being one of broadcast and cablecast.

95. (Amended) The method of claim 94, further comprising making a record indicating that [the] said unit of programming was one of broadcast and cablecast.

96. (Amended) The method of claim 92, wherein said step of locating comprises the step of detecting [the] said unit identification information in [the] said television transmission during [said step of transferring the] transfer of said television transmission from [the] said first storage device to [the] said second storage device.

97. (Amended) The method of claim 91, wherein said step of transferring comprises the step of transferring [the] said unit of said television programming from [the] said first storage device to said second storage device, and said step of storing comprises storing [the] said unit of said television programming at said second storage device.

98. (Amended) The method of claim 91 wherein said step of transferring comprises the step of transferring [the unit] said identification information from [the] said first storage device to [the] said second storage device, and said step of storing comprises the step of storing [the unit] said identification information at said second storage device.

99. (Amended) The method of claim 91, wherein said step of locating comprises the step of:

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detecting [the unit] said identification information in [the] said television transmission prior to storage of [the] said television transmission at [the] said first storage device.

100. (Amended) A method of communicating subscriber station information from a subscriber station to at least one remote collection station, said method comprising the steps of:

[(1)] inputting an instruct signal which is effective at said subscriber station to select and control communication of a datum which identifies information contained in a program;

[(2)] detecting the presence of at least one of an instruction, code and datum, associated with said instruct signal, which is effective at the subscriber station to one of generate subscriber station specific data and to select and assemble a plurality of specific and subscriber station specific data into a record;

[(3)] processing at the subscriber station inputted data and performing, in response to said detected instruction, one of:

(a) generating said subscriber station specific data and communicating said generated subscriber station specific data to a transmitter; and

(b) selecting and assembling into said record a specific plurality of said subscriber specific data and communicating said record and said selected specific plurality of said subscriber specific data to a transmitter; and

[(4)] transmitting one of said communicated generated subscriber station specific data and said communicated record and specific plurality of said subscriber specific data to said at least one remote collection station.

101. (Amended) A method of processing signals at a receiver station comprising the steps of:

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[(1)] receiving information transmissions;

[(2)] detecting a plurality of signals in at least one of said information transmissions, at least one of said detected plurality of instruct signals being effective at said receiver station to instruct;

[(3)] passing each of said detected instruct [signal] signals to a computer;

[(4)] controlling said computer on the basis of each of said detected and passed instruct [signal] signals;

[(5)] selecting and controlling communication, under computer control and in response to at least a first of said [each] detected and passed instruct [signal] signals, of a datum that identifies information contained in a program; and

[(6)] storing information evidencing the passing of at least a second of said [each] detected and passed instruct [signal] signals.

102. (Amended) The method of claim 101, further comprising one of the steps of:

generating a signal to control a tuner to receive a television program in response to at least one of said detected and passed instruct [signal] signals;

displaying a television program at a television monitor;

inputting said information transmissions to a control signal detector in response to a command;

storing a television program at one of a memory and recorder;

detecting and storing information evidencing a function performed by said computer in response to at least one of said detected and passed instruct [signal] signals;  
[and]

assembling a record of at least one of availability, use and usage of a television program;

logging the transmission of a television program to said receiver station; and

transmitting stored evidence information to a remote data collection station.

103. (Amended) A method of controlling a remote intermediate mass medium program transmitter station to communicate mass medium program material to a remote receiver station and controlling said remote receiver station to deliver an individualized mass medium program presentation, said method of controlling comprising the steps of:

[(1)] receiving mass medium programming to be transmitted by [the] said remote intermediate mass medium transmitter station and delivering said mass medium programming to a transmitter;

[(2)] receiving at least one instruct signal at said remote intermediate mass medium transmitter station, wherein said at least one instruct signal operates at [the] said remote receiver station to select and control communication of a datum which identifies information contained in said mass medium programming, and communicating said at least one instruct signal to said transmitter;

[(3)] receiving at least one control signal at said remote intermediate mass medium transmitter station, said at least one control signal operates at [the] said remote intermediate mass medium transmitter station to control communication of one of said mass medium programming and said at least one instruct signal; and

[(4)] transmitting from said remote intermediate mass medium transmitter section an information transmission comprising said mass medium programming and said at least one instruct signal, said mass medium programming and said at least one instruct signal transmitted in accordance with said at least one control signal.

104. (Amended) A method of controlling a remote transmitter station to deliver a receiver specific mass medium program presentation at a receiver station, said method of communicating comprising the steps of:

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[(1)] receiving a mass medium program at [the] said remote transmitter station and delivering said mass medium program to a transmitter;

[(2)] receiving at said remote transmitter station at least one instruct signal which operates to select and control communication of one of a code and datum which identifies information contained in said mass medium program;

[(3)] receiving a control signal which operates at [the] said remote transmitter station to control [the] communication of at least one instruct signal and communicating said control signal to said remote transmitter station;

[(4)] receiving said one of [said] a code and [said] a datum designating a specific instruct signal of said at least one instruct signal to be transmitted by [the] said remote transmitter station, and said remote transmitter station transferring said designated specific instruct signal to a transmitter; and

[(5)] transmitting from said remote transmitter station an information transmission comprising said mass medium program and said designated specific instruct signal, said designated specific instruct signal being transmitted at one of specific times and on specific channels.

105. (Amended) A method of controlling at least one of a plurality of receiver stations each of which includes a television receiver, a signal detector, at least one of a computer and processor, wherein each of said plurality of receiver stations is adapted to detect the presence of at least one control signal and to input a subscriber reaction to a specific offer communicated in a television program, said method comprising the steps of:

[(1)] receiving at least one of a code and a datum at a transmitter station, wherein said one of [said] a code and [said] a datum designates at least one of a product and a service offered in said television program and said subscriber reaction;

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[(2)] receiving said at least one control signal at said transmitter station, said at least one control signal at said at least one of said plurality of receiver stations operates to select and control communication of information at least one of received with and to be associated with said television program;

[(3)] transferring at least one of (i) said at least one of a code [(ii) said] and a datum and [(iii)] (ii) said at least one control signal to a transmitter at said transmitter station at a specific time; and

[(4)] transmitting (i) said at least one of [said] a code and [said] a datum and (ii) said at least one control signal from said transmitter station.

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106. (Amended) A method of communicating television program material to at least one receiver station including one of a broadcast and cablecast television receiver, a television monitor, a control signal detector, a processor operatively connected to said television monitor, said processor programmed to detect and respond to at least one instruct signal in one of a broadcast and cablecast transmission, said method comprising the steps of:

[(1)] receiving a television program at a transmitter station and delivering said television program to a transmitter;

[(2)] receiving [and storing] said at least one instruct signal at said transmitter station, said at least one instruct signal at [the] said at least one receiver station operates to select and control communication of a datum which identifies information contained in said television program;

[(3)] transferring said at least one instruct signal from said transmitter station to a transmitter; and

[(4)] transmitting said television program and said at least one instruct signal from said transmitter station to said at least one receiver station.



107. (Unchanged) A method of communicating programming in a communications network, said communications network including at least one origination station and an intermediate transmission station, said intermediate transmission station having a transmitter, at least one selective transfer device operatively connected to said transmitter for transferring programming, an automatic control unit operatively connected to said at least one selective transfer device, a first detector operatively connected to said automatic control unit for detecting first signals, a receiver operatively connected to said first detector, a second detector operatively connected to said transmitter for detecting second signals, and a logging unit operatively connected to said second detector, said method comprising the steps of:

transmitting from said origination stations said programming, said programming including at least one signal for comparison; transmitting at least one retransmission control signal from said origination stations;

said intermediate transmission station receiving said programming; detecting and passing to said automatic control unit said at least one retransmission control signal; and

said automatic control unit performing the step of selectively transferring said programming to said transmitter in accordance with said at least one retransmission control signal.

108. (Unchanged) A method of controlling a network having a remote intermediate transmitter station and at least one receiver station, with said remote intermediate transmitter station including at least one intermediate transmitter for transmitting a signal, a plurality of selective transfer devices each operatively connected to said at least one intermediate transmitter for communicating said signal, a receiver for receiving said signal from outside said network, an instruction detector, and a controller capable of controlling at least one of said plurality of selective transfer devices, and with said remote intermediate transmitter station adapted to (1) detect at least one instruction,

(2) control communication of at least one signal in response to said at least one instruction, and (3) deliver said at least one signal to said at least one intermediate transmitter, said method comprising the steps of:

receiving said signal outside said network, said signal having at least one first instruction which is operative in said network to output said signal from a first storage location and store said signal at a second storage location;

receiving at least one second instruction outside said network, said at least one second instruction operative at said remote intermediate transmitter station to control communication of said signal; and

transmitting said signal and said at least one second instruction to said network before a specific time.

109. (Unchanged) The method of claim 108, wherein television programming is communicated to and stored at said second storage location based on one of said at least one first instruction and said at least one second instruction, said method further comprising the step of:

transmitting said television programming to one of said remote intermediate transmitter station and said at least one receiver station.

110. (Unchanged) The method of claim 108, wherein said network communicates at least one of a television transmission and a radio transmission, said method further comprising the step of embedding said signal in one of a non-visible portion of said television transmission and a non-audible portion of one of said television and said radio transmission.

111. (Unchanged) The method of claim 110, wherein said at least one receiver station stores at least a portion of said at least one of a television transmission and a radio transmission based on said signal.

112. (Unchanged) The method of claim 110, wherein said signal contains one of a code and a datum which identifies information contained in said at least one of a television transmission and a radio transmission, said method further comprising the steps of:

processing said one of a code and a datum; and  
transmitting said signal based on said step of processing.

113. (Unchanged) The method of claim 110, further comprising the step of comparing at least some of said at least one first instruction to at least a portion of said at least one second instruction.

114. (Unchanged) The method of claim 110, wherein said step of embedding is performed before at least a portion of said signal is transmitted to said remote intermediate transmitter station.

115. (Unchanged) The method of claim 108, wherein said signal contains one of television and radio programming, said method further comprising the step of:  
embedding said at least one first instruction and said at least one second instruction in one of a non-visible and a non-audible portion of said signal.

116. (Unchanged) The method of claim 115, wherein said step of embedding is performed before at least a portion of said signal is transmitted to said remote intermediate transmitter station.

117. (Unchanged) The method of claim 108, wherein downloadable code containing one of said at least one first instruction and said at least one second instruction is assembled in said network, said method further having one step from the group consisting of:

transmitting one of said at least one first instruction and said at least one second instruction in a plurality of signal words; and

transmitting at least two first instructions and said at least one second instruction to said network at different times.

118. (Unchanged) The method of claim 108, wherein data is one of assembled and communicated in said network based on said at least one first instruction and said at least one second instruction, said method further having one step from the group consisting of:

transmitting one of a code and a datum which is operative in said network to designate one of an information and a signal type to be one of assembled and communicated; and

transmitting one of a code and a datum which one of designates and identifies said data.

119. (Unchanged) The method of claim 118, wherein said data one of are transmitted from said remote intermediate transmitter station and include downloadable code.

120. (Unchanged) The method of claim 118, wherein a control signal is organized and operates in said network to one of designate and identify one of a location

of one of said signal and said data and a source communicating one of said signal and said data.

121. (Unchanged) The method of claim 118, wherein said at least one first instruction includes said one of a code and a datum.

122. (Unchanged) The method of claim 118, wherein said at least one second instruction includes said one of a code and a datum, said method further comprising the step of:

transmitting a third instruction which is operative in said network to instruct comparison.

123. (Unchanged) The method of claim 108, wherein said specific time is a scheduled time of transmitting said signal from said remote intermediate transmitter station.

124. (Unchanged) The method of claim 108, wherein said plurality of selective transfer devices include a switch and a storage device, said method comprising the steps of:

transmitting at least one switch control instruction; and

transmitting at least one storage control instruction.

125. (Unchanged) The method of claim 108, wherein said plurality of selective transfer devices include a computer and a computer peripheral memory, said computer capable of communicating to a plurality of devices, said memory capable of storing said signal, said method further comprising the steps of:

transmitting at least one communication control instruction; and

transmitting at least one storage control instruction.

126. (Unchanged) The method of claim 108, wherein said at least one second instruction comprises one of a code and a datum which operates at said remote intermediate transmitter station to identify said signal, said method further comprising the step of:

transmitting a schedule which operates at said remote intermediate transmitter station to communicate said signal to a separate transmitter.

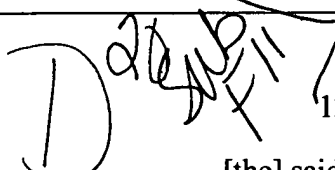
127. (Unchanged). The method of claim 126, wherein said schedule controls communication of a plurality of signals of one of television, radio, data, and multimedia programming, said method further having at least one step from the group consisting of:

transmitting at least one of said plurality of signals of one of television, radio, data, and multimedia programming;

transmitting one of a code and a datum which designates at least one of said plurality of signals of one of television, radio, data, and multimedia programming;

transmitting a fourth instruction which is operative in said network to output at least one of said plurality of signals of one of television, radio, data, and multimedia programming from a storage location; and

transmitting a fifth instruction which is operative in said network to store at least one of said plurality of signals of one of television, radio, data, and multimedia programming.

 128. (Amended) The method of claim 126, wherein said schedule operates at [the] said remote intermediate transmitter station to communicate said signal to one of a plurality of transmitters and said separate transmitter a plurality of times.

129. (Unchanged) The method of claim 108, wherein said second storage location is at said at least one receiver station, said method further having one step from the group consisting of:

transmitting a sixth instruction which is operative to select one of said first storage location and said second storage location; and

transmitting a seventh instruction which is operative to designate said at least one receiver station to store said signal.

130. (Unchanged) A method of controlling a network having a remote intermediate transmitter station and at least one receiver station, with said remote intermediate transmitter station including at least one intermediate transmitter for transmitting at least one signal, a plurality of selective transfer devices each operatively connected to said at least one intermediate transmitter for communicating said at least one signal, a receiver for receiving said at least one signal from outside said network, an instruction detector, and a controller capable of controlling at least one of said plurality of selective transfer devices, and with said remote intermediate transmitter station receiving said at least one signal, at least one first instruction, and at least one second instruction, said method comprising the steps of:

programming said remote intermediate transmitter station to control communication of and deliver said at least one signal at said at least one intermediate transmitter in response to at least one detected instruction;

programming said remote intermediate transmitter station to detect said at least one first instruction and said at least one second instruction; and

programming said network to detect and respond to an instruction which is operative in said network to output said at least one signal from a first storage location and store said at least one signal at a second storage location before a specific time.

131. (Unchanged) The method of claim 130, wherein television programming is communicated to and stored at one of said first storage location and said second storage location based on one of said at least one first instruction and said at least one second instruction, said method further comprising the step of:

programming one of said remote intermediate transmitter station and said at least one receiver station to store television programming at a storage location in response to one of said at least one first instruction and said at least one second instruction received from a remote station.

132. (Unchanged) The method of claim 130, further comprising the step of:

programming one of said remote intermediate transmitter station and said at least one receiver station to detect one of said at least one first instruction and said at least one second instruction embedded in one of a non-visible portion of a television transmission and a non-audible portion of a radio transmission.

133. (Unchanged) The method of claim 132, wherein said at least one receiver station stores at least a portion of one of said television and said radio transmission based on said at least one signal, said method further comprising the step of:

programming said at least one receiver station to select said at least a portion of one of said television transmission and said radio transmission by processing stored subscriber data.

134. (Unchanged) The method of claim 132, wherein said at least one signal contains one of a code and a datum which identifies information contained in one of said television transmission and said radio transmission, said method further comprising the steps of:



programming one of said remote intermediate transmitter station and said at least one receiver station to process said one of a code and a datum; and

programming one of said remote intermediate transmitter station and said at least one receiver station to communicate said at least one signal to one of a storage device and an output device based on processing said one of a code and a datum.

135. (Unchanged) The method of claim 132, further comprising the step of:  
programming one of said remote intermediate transmitter station and said at least one receiver station to compare at least some of said at least one first instruction to at least a portion of said at least one second instruction.

136. (Unchanged) The method of claim 132, further comprising the step of:  
programming one of said remote intermediate transmitter station and said at least one receiver station to one of detect and identify an instruction based on a varying pattern of one of location, timing and composition.

137. (Unchanged) The method of claim 130, wherein said at least one signal contains one of television and radio programming, said method further comprising the step of:

programming one of said remote intermediate transmitter station and said at least one receiver station to identify said at least one first instruction and said at least one second instruction.

138. (Unchanged) The method of claim 137, further comprising the step of:  
programming one of said remote intermediate transmitter station and said at least one receiver station to one of detect and identify an instruction based on a varying pattern of one of location, timing and composition.

139. (Unchanged) The method of claim 130, wherein executable code containing said at least one first instruction and said at least one second instruction is assembled in said network, said method further having one step from the group consisting of:

programming one of said remote intermediate transmitter station and said at least one receiver station to assemble code based on at least one discrete signal detected in a transmission; and

programming one of said remote intermediate transmitter station and said at least one receiver station to assemble code based on discrete signals received at different times.

140. (Unchanged) The method of claim 130, wherein data is one of assembled and communicated in said network based on said at least one first instruction and said at least one second instruction, said method further having one step from the group consisting of:

programming one of said remote intermediate transmitter station and said at least one receiver station to respond to one of a code and datum which is operative in said network to designate one of an information and a signal type to be one of assembled and communicated; and

programming one of said remote intermediate transmitter station and said at least one receiver station to respond to one of a code and a datum which one of designates and identifies said data.

141. (Unchanged) The method of claim 140, further comprising the step of:  
programming said at least one receiver station to respond to at least one downloadable instruction which is transmitted from said remote intermediate transmitter station.

142. (Unchanged) The method of claim 140, further comprising the step of:  
programming one of said remote intermediate transmitter station and said at least one receiver station to organize one of said at least one first instruction and said at least one second instruction which operates in said network to one of designate and identify one of a location of one of said at least one signal and said data and a source communicating one of said at least one signal and said data.

143. (Unchanged) The method of claim 140, further comprising the step of:  
programming one of said remote intermediate transmitter station and said at least one receiver station to one of locate and identify said one of a code and a datum based on one of said at least one first instruction and said at least one second instruction.

144. (Amended) The method of claim 140, wherein said at least one second instruction includes said one of a code and a datum, said method further comprising the step of:  
programming one of said remote intermediate transmitter station and said at least one receiver station to perform a step of [comparision] comparison based on said at least one first instruction and said at least one second instruction.

145. (Unchanged) The method of claim 130, wherein said specific time is a scheduled time of transmitting said at least one signal from said remote intermediate transmitter station, said method further comprising the step of:  
programming said remote intermediate transmitter station to control said at least one of said plurality of selective transfer devices prior to said scheduled time based on said at least one first instruction and said at least one second instruction.

146. (Unchanged) The method of claim 130, wherein one of said remote intermediate transmitter station and said at least one receiver station includes a switch and a storage device, said method comprising the steps of:

programming one station in said network to respond to at least one switch control instruction; and

programming one station in said network to respond to at least one storage control instruction.

147. (Unchanged) The method of claim 130, wherein one of said remote intermediate transmitter station and said at least one receiver station includes a computer and a computer peripheral memory, said computer capable of communicating to a plurality of devices, said memory capable of storing said at least one signal, said method further comprising the steps of:

programming one station in said network to respond to at least one communication control instruction; and

programming one station in said network to respond to at least one storage control instruction.

148. (Unchanged) The method of claim 130, wherein one of said at least one first instruction and said at least one second instruction comprises one of a code and a datum which operates at said remote intermediate transmitter station to identify said at least one signal, said method further comprising the step of:

programming one station in said network to respond to a transmission schedule in respect of said at least one signal.

149. (Unchanged) The method of claim 148, wherein said transmission schedule controls communication of a plurality of signals of one of television, radio, data,

and multimedia programming, said method further having at least one step from the group consisting of:

programming one of said remote intermediate transmitter station and said at least one receiver station to communicate at least one of said plurality of signals of one of television, radio, data, and multimedia programming;

programming one of said remote intermediate transmitter station and said at least one receiver station to respond to one of a code and a datum which one of designates and identifies at least one of said plurality of signals of one of television, radio, data, and multimedia programming;

programming one of said remote intermediate transmitter station and said at least one receiver station to respond to an instruction which is operative in said network to output at least one of said plurality of signals of one of television, radio, data, and multimedia programming from a storage location; and

programming one of said remote intermediate transmitter station and said at least one receiver station to respond to an instruction which is operative in said network to store at least one of said plurality of signals of one of television, radio, data, and multimedia programming.

150. (Unchanged) The method of claim 148, further comprising the step of:

programming one of said remote intermediate transmitter station and said at least one receiver station to communicate said at least one signal to one of a plurality of output devices and an output device a plurality of times.

151. (Unchanged) The method of claim 130, wherein said second storage location is at said at least one receiver station, said method further having one step from the group consisting of:

programming said network to respond to one of said at least one first instruction and said at least one second instruction which is operative to select a storage location; and  
programming said network to respond to one of said at least one first instruction and said at least one second instruction which is operative to cause said network to store said at least one signal.

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152. (Amended) A method of controlling a network having a remote intermediate transmitter station and at least one receiver station, with said remote intermediate transmitter station including at least one intermediate transmitter for transmitting data, a plurality of selective transfer devices each operatively connected to said at least one intermediate transmitter for communicating said data, a receiver for receiving said data from outside said network, a control signal detector, and a controller capable of controlling at least one of said plurality of selective transfer devices, and with said remote intermediate transmitter station adapted to detect at least one control signal, to control [the] communication of said data in response to said at least one control signal, and to deliver said data at said at least one intermediate transmitter, said method comprising the steps of:

receiving said data outside said network, said data including an instruct signal which is effective in said network to output said data from a first storage location and store said data at a second storage location;

receiving said at least one control signal outside said network, said at least one control signal operative at said remote intermediate transmitter station to control communication of said data; and

transmitting said at least one control signal to said network before a specific time.

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153. (Amended) A method of processing data at a receiver station, said receiver station including a television monitor for displaying television programming and

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a plurality of storage locations, each storage location capable of storing data, said television monitor capable of displaying a video image comprised of data stored in a one of said plurality of storage locations overlaid on television programming, said receiver station being capable of communicating stored data selectively to and from each of said plurality of storage locations in response to at least one command, said method comprising the steps of:

receiving an information transmission;  
detecting embedded data on said information transmission;  
selecting a specific datum of said detected data; and  
storing said selected datum at a storage location of a storage device that is not communicating or outputting data to said television monitor, said step of storing enabling [the] said storage device to communicate or output said selected datum to a processor in response to a control signal and said television monitor to display in television programming at a selected time processed information of said selected datum.

154. (Unchanged) The method of claim 153 further comprising the step of identifying said selected datum.

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155. (Amended) The method of claim 154 wherein said step of identifying comprises the step of comparing at least a portion of [the] said selected datum to previously stored information describing a plurality of data.

156. (Amended) The method of claim 154 wherein said step of storing comprises the step of storing said selected datum and identification information identifying [the] said selected datum at a storage location of a storage device to enable [the] subsequent identification of [the] said selected datum based on [the] said identification information. has been amended to correct an antecedent basis problem.

157. (Amended) The method of claim 156 further comprising the steps of:  
receiving a control signal;  
detecting [the] said control signal; and  
performing the following steps in response to detecting [the] said control signal:

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- (a) identifying [the] said storage location storing [the] said selected datum based on [the] said stored identification information;
  - (b) outputting [the] said selected datum from [its] said storage location to a receiver station processor;
  - (c) processing [the] said selected datum; and
  - (d) displaying [the] said processed datum on [the] said television monitor.

158. (Amended) The method of claim 157 wherein said step (c) comprises the step of processing [the] said selected datum to generate one or more graphics; and  
said step (d) comprises the step of displaying [the] said one or more generated graphics on [the] said television monitor.

159. (Amended) The method of claim 156 wherein said step of storing comprises the steps of:

embedding said identification information in [the] said selected datum, said identification information identifying [the] said selected datum; and

storing said selected datum and [its] said embedded identification information at a storage location of a storage device to enable [the] subsequent identification of [the] said selected datum based on [the] said identification information.



160. (Amended) The method of claim 154 further comprising the step of storing information indicating [the] said storage location storing [the] said selected datum.

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161. (Amended) The method of claim 153 wherein said step of storing comprises storing said selected datum in a file at a storage location of a storage device that is not communicating or outputting data to said television monitor, said step of storing enabling [the] said storage device to communicate or output said selected datum to a processor in response to a control signal to process said selected datum and display said processed datum.

162. (Amended) The method of claim 153 further comprising the steps of:  
receiving software or computer instructions from a remote source;  
storing said software or computer instructions to program or reprogram a computer at [the] said receiver station, said computer executing said software or computer instructions to perform one or more of said steps of detecting, selecting and storing.

163. (Unchanged) The method of claim 153 wherein said step of selecting comprises selecting a specific datum of said detected data, said selected datum comprising one from the group of:  
a news item;  
stock prices;  
a unit of television or radio programming;  
an identification signal identifying a unit of television or radio programming; and  
electronic or computer data.

164. (Amended) The method of claim 153 wherein said receiver station comprises an intermediate transmission station, said information transmission comprises a plurality of units of television programming, each of said [unit] units of television programming having an embedded identification signal identifying [the] that unit of television programming, and said method further comprises the step of receiving a programming schedule designating a time and a channel for communicating a plurality of [the] said units of programming;

said step of detecting comprising the step of detecting [the plurality of] said embedded identification [signals] signal of each of said units of television programming;  
and

said step of selecting comprises the step of selecting one of [the received] said units of television programming based on [the] said programming schedule and [the] said embedded identification signal of [the] said selected unit.

165. (Amended) The method of claim 164 wherein said step of selecting comprises the steps of:

comparing [the] said identification [signals] signal of each of [the received] said units of television programming to [the] said programming schedule; and

selecting one of [the] said units of television programming listed in [the] said programming schedule;

said step of storing comprises the step of storing [the unit] said one of said units of programming and [its] said identification signal of said one of said units of television programming at a storage location to enable [the] later identification of [the unit] said one of said units of television programming based on [the unit's] said identification signal of said one of said units of television programming.

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166. (Amended) The method of claim [14] 165 further comprising the steps of:

identifying, based on [the selected unit's] identification signal of said one of said units of television programming, [the] said storage location storing [the] said selected [unit] one of said units of television programming; and

communicating, under processor control, [the] said selected [unit] one of said units of television programming from [the] said storage location storing said selected one of said units of television programming to [the] said television monitor or a subscriber in accordance with [the] said programming schedule to display [the unit] said one of said units of programming.

167. (Amended) The method of claim 165 further comprising the steps of:  
processing [the] said identification signal of said one of said units of television programming by comparing [the] said identification signal of said one of said units of television programming to [the] said received programming schedule to determine [the] a time and channel for communicating [the unit] said one of said units of television programming [identified by the identification signal] ;

outputting [the unit] said one of said units of television programming [identified by the identification signal] ; and

communicating [the] said outputted [unit] one of said units of television programming to a receiver station or [the] said television monitor to display [the unit] said one of said units of television programming according to said programming schedule.

168. (Amended) The method of claim 153 wherein said receiver station comprises a viewer or subscriber station, said method further comprising the steps of:  
receiving a control signal; and

performing the following steps in response to receiving [the] said control signal:  
outputting [the] said selected datum from [the] said storage location to a  
processor;

processing [the] said selected datum; and

displaying [the] said processed selected datum on [a] said television monitor.

169. (Amended) The method of claim 168 wherein said information transmission further comprises a unit of television programming, said method further comprises the step of displaying [the received] said unit of television programming on [the] said television monitor.

170. (Amended) The method of claim 169, wherein said step of processing comprises the step of processing [the] said selected datum to generate a video graphic, and wherein said step of displaying [the] said processed selected datum comprises the step of displaying [the] said generated video graphic, said generated video graphic conveying user specific information related to said unit of television programming.

171. (Amended) The method of claim 170 wherein said steps of displaying [the] said generated video graphic and displaying [the] said unit of television programming results in displaying a video image comprising [the] said generated video graphic overlaid on [the] said unit of television programming.

172. (Amended) The method of claim 153 further comprising the steps of:  
receiving a second [carrier] information transmission comprising a unit of television programming and a digital control signal;

outputting at least a portion of [the] said unit of television programming on [the] said television monitor;

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detecting [the] said digital control signal;  
processing [the] said selected stored datum to generate, under computer control, a user specific graphic;  
outputting [the] said generated user specific graphic to [the] said television monitor in response to detecting [the] said digital control signal to present a combined display on [the] said television monitor of [the] said unit of television programming and [the] said user specific graphic.

173. (Amended) The method of claim 172, further comprising the step of tuning, automatically under computer control, to a predetermined frequency or channel to receive at least one of [the carrier transmissions] said information transmission and said second information transmission.

174. (Amended) The method of claim 172 wherein said step of processing comprises the steps of:  
reading [the] said selected datum from [the] said storage location;  
processing [the] said selected datum according to a previously stored software program to generate a user specific video graphic, said user specific video graphic conveying information related to said unit of programming and specific to [the] a user;  
and  
storing [the] said generated video graphic.

175. (Amended) The method of claim 172, wherein said embedded data comprises prices for each of a plurality of stock or financial shares;  
said step of selecting comprises the step of selecting [the] prices of [the] shares in a [user's] stock or financial portfolio of a user;  
said step of storing comprises storing [the] said selected prices of said shares;

wherein said step of processing comprises the steps of:

- (a) calculating, under computer control, [the] performance of [the user's] said stock or financial portfolio based on [the received] said selected prices; and
- (b) generating, under computer control, a graphic representing [the] said performance of [the user's] said stock or financial portfolio.

176. (Amended) The method of claim 175 wherein said step of generating comprises the step of generating a plurality of user specific graphic overlays representing [the] said performance of [the user's] said stock or financial portfolio;

said step of outputting the generated graphic comprises the step of sequentially outputting [the] said plurality of user specific generated graphic overlays to [the] said television monitor in response to detecting said digital control signal, said graphic overlays being user specific by representing [the] said performance of [the user's] said stock or financial portfolio of said user.

177. (Amended) The method of claim 153 further comprising the step of selecting one of a plurality of storage devices at [the] said receiver station and selecting a storage location in [the] said selected one of a plurality of storage [device] devices for storing [the received] said data, wherein said step of storing comprises storing [the] said selected datum at said selected storage location on said selected storage device.

178. (Unchanged) A method of processing data at a receiver station, said receiver station comprising a television monitor for displaying television programming, at least one processor and a plurality of storage locations, said method comprising the steps of:

receiving a carrier transmission;

demodulating said carrier transmission to detect an information transmission thereon, said information transmission comprising embedded data and at least one control signal;

detecting said embedded data and said at least one control signal on said information transmission;

selecting at least one datum of said detected embedded data; and

storing said selected at least one datum at a storage location of a storage device that is not communicating or outputting said detected embedded data to said television monitor;

processing said at least one datum in response to said at least one control signal; and

outputting processed information of said at least one datum to a subscriber.

179. (Unchanged) The method of claim 178 wherein said data comprises digital data, said step of demodulating comprises the step of demodulating said carrier transmission to detect an information transmission thereon, said information transmission comprising embedded data, a control signal and television programming; said method further comprising the steps of:

displaying said television programming on the television monitor;

detecting the control signal in the information transmission;

outputting, in response to detecting said control signal, said selected datum to the television monitor to display the selected datum overlaid on the displayed television programming.

180. (Unchanged) A method of processing a signal at a receiver station, said receiver station having a plurality of storage locations, said method comprising the steps of:

receiving a television or radio signal;  
demodulating said received signal to detect an information transmission thereon,  
said information transmission comprising radio or television programming and embedded  
data;  
detecting said embedded data in said information transmission;  
selecting a specific datum of said detected data;  
storing said selected datum;  
processing said at least one datum; and  
outputting a control signal containing processed information of said at least one  
datum.

181. (Unchanged) The method of claim 180 wherein said step of receiving  
comprises the step of receiving a plurality of television or radio signals, each signal  
comprising embedded data and being received on a different channel or frequency, said  
step of selecting comprises the step of selecting a datum from each received signal, said  
step of storing comprises the step of concurrently storing each of the selected datum.

182. (Unchanged) The method of claim 181 further comprising the steps of:  
receiving a control signal;  
detecting the control signal;  
processing a plurality of said stored datum in response to detecting said control  
signal.

183. (Unchanged) The method of claim 180 wherein said at least one datum  
designates said radio or television programming, and said control signal controls a tuner  
to tune a receiver to receive said radio or television programming.



184. (Unchanged) The method of claim 180 wherein said processed information identifies at least one of a channel or frequency spectrum contained in said information transmission.

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185. (Amended) The method of claim 180 wherein said at least one datum includes a discrete [signalling] ~~signaling~~ appearance, said method further comprising the step of assembling at least one of a processor instruction based on said at least one discrete [signalling] ~~signaling~~ appearance.

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186. (Unchanged) The method of claim 180 wherein said receiver station includes a plurality of controllable devices, said method further comprising the steps of:  
selecting one of said plurality of controllable devices based on at least one of said at least one datum and said processed information contained in said control signal; and  
passing said control signal to said selected one of said controllable devices.

187. (Unchanged) The method of claim 186 wherein plurality of devices includes at least one decryptor and said control signal includes code, said method further comprising the step of decrypting at least a portion of said information transmission based on said code.

188. (Unchanged) A method of processing a signal at a receiver station having a plurality of storage locations, said method comprising the steps of:  
receiving a television or radio signal;  
demodulating said received signal to detect an information transmission thereon, said information transmission containing radio or television programming, embedded data, and at least a first control signal;

detecting said embedded data in said information transmission, said embedded data comprising at least identification information identifying programming;  
selecting one of said plurality of storage locations;  
storing said received television or radio signal.

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189. (Amended) The method of claim 188 further comprising the steps of:  
determining at least one of the following based on processing [the] said embedded data:

(a) when and where to receive [the] said programming identified by [the] said embedded data; and

(b) when and over what channel or frequency to communicate the programming; and

receiving or communicating [the] said programming identified by [the] said embedded data in accordance with said step of determining.

190. (Amended) The method of claim 189, further comprising the steps of:  
receiving a programming schedule designating for each of a plurality of programming at least one of:

(a) when and where to receive [the] said programming; and

(b) when and over what channel or frequency to communicate [the] said programming;

storing said programming schedule;

said step of determining comprises the steps of:

comparing [the] said identification information of [the] said embedded data to the programming schedule; and

determining at least one of the following based on said step of comparing:

(a) when and where to receive [the] said programming; and

(b) when and over what channel or frequency to communicate [the] said programming.

191. (Amended) The method of claim 190 wherein said step of receiving a programming schedule comprises at least one of the following steps of:

receiving [the] said programming schedule on a carrier transmission;  
receiving [the] said programming schedule from a local input device; and  
querying a remote computer to obtain [the] said programming schedule from [the] said remote computer.

192. (Amended) A method of processing a signal at a receiver station, said receiver station having a plurality of storage locations, each storage location being capable of storing information including one or more television or radio programming units, said method comprising the steps of:

receiving a television or radio signal;  
demodulating said received signal to detect an information transmission thereon, said information transmission comprising a programming unit of radio or television programming and embedded data;  
detecting said embedded data in said information transmission;  
selecting a storage location;  
storing said programming unit and [its] said embedded data in [the] said selected storage location in response to said step of detecting said embedded data.

193. (Amended) The method of claim 192 wherein said embedded data comprises an identification signal identifying [the] said programming unit [of programming] , and said step of storing comprises the step of storing said programming

unit and [its] said identification signal in [the] said selected storage location in response to detecting said identification signal.

194. (Amended) The method of claim 193, wherein said step of selecting comprises the step of selecting one of a plurality of storage devices, said step of storing comprises the step of storing said programming unit and [its] said identification signal in [the] said selected storage device.

195. (Amended) The method of claim 194, further comprising the steps of:  
receiving schedule information that specifies for [the] said programming unit [of programming] , a time and a channel or frequency to communicate [the] said unit of programming and [the] said identification signal [for the unit] ;

determining when and on which channel or frequency [the] said stored programming unit [of programming] should be communicated based on comparing [the] said identification signal [of the stored unit of programming] to [the] said received schedule information;

selecting [the] said programming unit [of programming] that is stored on [the] said selected storage device based on said identification signal;

outputting said selected unit of programming from [the] said selected storage device to communicate said programming unit according to said schedule information.

196. (Amended) The method of claim 195 further comprising the step of controlling a switch to connect [the] said selected storage device to a transmitter or channel modulator to communicate [the] said outputted programming unit according to said schedule information.

197. (Amended) The method of claim 195 further comprising the step of logging [the] communication of said programming unit [of programming] based on said identification signal.

198. (Amended) The method of claim 197 wherein said step of outputting further comprises the step of outputting [the unit] said identification signal with said programming unit [of programming], and said step of logging comprises the steps of:

monitoring [the] signals and programming output or communicated;  
detecting [the] outputting or communicating of [the unit] said identification signal;

recording [the] said identification signal of [the] said programming unit [of output or communicated], and [the] a time and channel of communication.

199. (Amended) The method of claim 192 further comprising the step of logging or recording [the] receipt of [the] said television or radio signal.

200. (Amended) The method of claim 192 further comprising the step of logging or recording [the] receipt of [the] said embedded data and its storage location.

201. (Unchanged) A method of processing a signal at a receiver station, said receiver station having a plurality of storage locations, each storage location being capable of storing information including one or more television or radio programming units, said method comprising the steps of:

receiving a television or radio signal;

demodulating said received signal to detect an information transmission thereon, said information transmission comprising a unit of radio or television programming and embedded data;

detecting said embedded data in said information transmission;  
determining, based on said embedded data, whether said received unit of programming should be stored or is designated for delayed communication;  
performing the following steps if said received unit of programming should be stored or is designated for delayed communication:  
(a) selecting a storage location; and  
(b) storing said programming unit and its embedded data in the selected storage location.

202. (Amended) A method of processing signals at a receiver station comprising the steps of:  
receiving a multichannel transmission, each received channel transmission of said multichannel transmission comprising information and an identification signal identifying [the] said information or [its] a source of said information;  
scanning a plurality of [the] channels of said multichannel transmission for a predetermined identification signal that identifies information of interest;  
detecting [the] said predetermined identification signal on one of [the] said plurality of channels;  
identifying [the] a channel of [the] said detected predetermined identification signal;  
tuning to [the] said identified channel to receive [the] said information of interest based on said step of identifying;  
receiving [the] said information of interest; and  
storing [the] said received information of interest.

203. (Amended) The method of claim 202 further comprising the steps of:

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processing [the] said received information of interest according to a stored software program;  
receiving a control signal;  
detecting [the] said control signal;  
displaying [the] said processed information of interest on a television monitor in response to detecting [the] control signal.

204. (Amended) The method of claim 202 wherein said step of storing comprises the step of storing the received information of interest with identification information identifying [the] said information of interest, said method further comprising the steps of:

receiving a unit of television programming;  
displaying the unit of television programming on a television monitor;  
receiving a control signal;  
detecting the received control signal; and  
performing the following steps in response to detecting the control signal:  
(a) identifying the stored information of interest based on the stored identification information;  
(b) processing the stored information of interest to generate a user specific graphic, said graphic conveying user specific information related to said displayed unit of programming; and  
(c) outputting the graphic to the television monitor present a combined display on the monitor of the user specific graphic and the unit of programming.

205. (Unchanged) An apparatus for processing signals at a receiver station comprising:

a receiver for receiving and demodulating a carrier transmission, said carrier transmission comprising embedded data;

a detector operatively connected to said receiver for detecting the embedded data in the carrier transmission;

a storage device having a plurality of storage locations;

a television monitor; and

a computer operatively connected to said receiver, said detector, said storage device and said monitor, said computer programmed to perform the following steps:

- (a) selecting a datum of the detected data;
- (b) identifying the datum;
- (c) storing the selected datum in the storage device with an identification signal identifying the datum to enable the subsequent identification of the datum based on the identification signal;
- (d) receiving information from the detector indicating that the detector has received a control signal, and performing the following steps (e)-(g) in response to said step (d);
- (e) identifying the stored selected datum based on the stored identification signal;
- (f) processing the selected datum; and
- (g) displaying the processed datum on the television monitor.

206. (Unchanged) A method of providing data of interest to a receiver station from a remote data source, said data of interest for use at the receiver station in generating or outputting a receiver specific datum, said method comprising the steps of:

storing data at said remote data source;

receiving at said remote data source a query from said receiver station;



transmitting said data from said remote data source to said receiver station in response to said step of receiving said query, said receiver station selecting and storing some of said transmitted data;

transmitting from a second remote source to said receiver station a signal which controls said receiver station to select and process an instruct signal which is effective at said receiver station to output a stored datum for processing and use with a video image.

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207. (Amended) A method of processing signals at a receiver station having a computer and an output device to deliver at [the] said output device a combined or sequential presentation of a program and a user specific output, said computer having a storage device for storing user data and said output device outputting mass medium programming and other information, said method comprising the steps of:

receiving a broadcast or cablecast information transmission including a first instruct signal which is effective to store a datum for subsequent processing and use with a video image;

storing user data of interest in response to said first instruct signal;

receiving mass medium programming from a programming source and outputting [the] said mass medium programming at said output device;

detecting a second instruct signal and passing said detected second instruct signal to said computer; and

controlling said computer based on said detected second instruct signal, said step of controlling comprising:

- (1) selecting a specific portion of said stored user data of interest;
- (2) communicating said selected specific portion of said stored user data of interest to said output device; and subsequently
- (3) ceasing to communicate said selected specific portion to said output device;

(4) delivering at said output device [the] said combined or sequential output of said received mass medium programming and said selected specific portion of said stored user data of interest in the period of time between said step of communicating said selected specific portion to said output device and said step of ceasing to communicate said selected specific portion to said output device.

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208. (Amended) A method of controlling one or more of a plurality of receiver stations each of which includes a television receiver, a signal detector, at least one computer or processor, and with each said receiver station adapted to detect the presence of one or more control signals and to input a subscriber reaction to a specific offer communicated in a television program, said method of controlling comprising the steps of:

[(1)] receiving code or datum at a transmitter station, said code or datum designates (i) a product or service offered in said television program or (ii) said subscriber reaction;

[(2)] receiving one or more control signals at said transmitter station, said one or more control signals at [the] said one or more receiver stations operate to store said code or datum for subsequent processing and use with a video image;

[(3)] transferring said code or datum or said one or more control signals to a transmitter at said transmitter station at a specific time; and

[(4)] transmitting said code or datum and said one or more control signal from said transmitter station.

209. (Unchanged) A method of processing signals to control a subsequent presentation of television programming comprising the steps of:

receiving a television signal containing television programming and communicating said television signal to a storage device;

receiving an instruct signal which is to be effective to select and store a datum for processing and use with said television signal;

selecting one of:

- (1) a time at which to communicate said instruct signal; and
- (2) a location to which to communicate said first instruct signal;

communicating said instruct signal at said selected time or to said selected location; and

storing said television signal and said instruct signal at said storage device, wherein said method processes signals to control said subsequent presentation of said television programming.

D<sup>30</sup> Cont.  
210. (Amended) A method of communicating data and update material to one or more mass medium programming receiver stations each of which includes a broadcast or cablecast data receiver, a data storage device, a control signal detector, a computer capable of processing data, and with each said receiver station adapted to detect and respond to one or more instruct signals and to store data for subsequent processing, said method comprising the steps of:

[(1)] receiving data to be transmitted and delivering [the] said data to a transmitter;

[(2)] receiving one or more instruct signals which at [the] said one or more receiver [station] stations are effective to store a datum for subsequent processing and use with a video image;

[(3)] transferring said one or more instruct signals to a transmitter; and

[(4)] transmitting an information transmission comprising said data and said one or more instruct signals.

211. (Amended) An interactive method for data promotion and delivery for use with an interactive mass medium program output apparatus comprising the steps of:

[displaying] ~~outputting~~ a mass medium program that promotes data, said interactive mass medium program output apparatus having an input device to receive input from a subscriber;

prompting said subscriber during said mass medium program whether said subscriber wants said data promoted in said step of displaying, said interactive mass medium program output apparatus having an output device for outputting said data;

receiving a reply from said subscriber at said input device in response to said step of prompting said subscriber, said interactive mass medium program output apparatus having a processor for processing said subscriber reply and controlling delivery of said data in response to instructions;

delivering instructions at said interactive mass medium program output apparatus in response to said step of receiving a reply, said instructions controlling said interactive mass medium program output apparatus;

processing said instructions from said step of delivering, said instructions effective to receive and store said data; and

delivering said data on the basis of said instructions.

212. (Amended) The method of claim 211, wherein information evidencing the availability, use or usage of said mass medium program or said data are stored or communicated to a remote data collection station, said method further comprising the step of selecting evidence information that identifies or designates one or more of:

- (1) a mass medium program;
- (2) a use of programming;
- (3) a transmission station;
- (4) a receiver station;

- 30  
Dmt.
- (5) a network;
  - (6) a broadcast station;
  - (7) a channel on a cable system;
  - (8) a time of transmission;
  - (9) a unique identifier datum;
  - (10) a source or supplier of data;
  - (11) a [publication, article, publisher,] distributor [,] or an advertisement; and
  - (12) an indication of [copyright.] a payment obligation.

213. (Amended) The method of claim 211, wherein said instructions incorporate executable code said method further comprising the steps of communicating said executable code to said processor and performing, on the basis of said executable code, one step selected from the group consisting of:

- (1) receiving a signal containing said data;
- (2) actuating a video, audio, or print output device, as appropriate, to output said data;
- (3) decrypting at least a portion of said data;
- (4) controlling a selective transmission device to communicate said selected specific output to said selected specific output device;
- (5) generating a receiver specific datum to present with said data; and
- (6) delivering a receiver specific datum at said interactive mass medium program output apparatus simultaneously or sequentially with said mass medium program or said data.

214. (Amended) A method of presenting user specific programming at a receiver station, said receiver station including a receiver, a detector, a computer, and at least one output device, said method comprising the steps of:

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receiving first data and first television programming, said first television programming including audio [and being of] said first television programming to be outputted for a duration of time, only a portion of said duration containing at least a first time interval of specific relevance, at least a first of said first data and said first television programming being received from at least a first remote transmitter station;

delivering at least said audio to said at least one output device for output to a user;

detecting said first data before a first time period during which user specific information will be processed;

delivering said first data to said computer;

generating second data to serve as a basis for delivering said user specific programming by processing at least a first of said first data in said first time period;

selecting third data based on said step of generating said second data;

communicating at least a first of said third data to said at least one output devices before the end of said first time interval of specific relevance; and

outputting said user specific programming, said user specific programming including at least said audio and said at least ~~said~~ a first of said third data.

215. (Amended) A method of delivering user specific programming at one or more receiver stations, each of said one or more receiver stations including a [broadcast or cablecast program] receiver, an output device, a control signal detector, a processor operably connected to said output device, and with each of said one or more receiver stations adapted to detect first data and generate second data, said second data to serve as a basis for communicating user specific information, said method of communicating comprising the steps of:

receiving one or more of (i) said first data, and (ii) television programming at one or more transmitter stations, said television programming [being of] to be outputted for a

duration of time, only a portion of said duration containing a time interval of specific relevance;

transferring said one or more of (i) said first data, and (ii) television programming to one or more transmitters at a specific time; and

transmitting from said one or more transmitter stations one or more information transmissions comprising said one or more of (i) said first data, and (ii) television programming.

216. (Amended) A method of delivering user specific programming at one or more receiver stations, each of said one or more receiver stations including a [broadcast or cablecast program] receiver, an output device, a control signal detector, a processor operably connected to said output device, and with each of said one or more receiver stations adapted to detect first data and generate second data, said second data to serve as a basis for communicating user specific information, said method of communicating comprising the steps of:

receiving one or more of (i) said first data, and (ii) television programming at one or more transmitter stations, said television programming [being of ] to be outputted for a duration of time, only a portion of said duration containing a time interval of specific relevance;

receiving a control signal which operates at said one or more transmitter stations to communicate said one or more of (i) said first data, and (ii) television programming to one or more transmitters to a transmitter; and

transmitting from said one or more transmitter stations one or more information transmissions comprising said one or more of (i) said first data, and (ii) television programming.

217. (Amended) A method of presenting user specific programming at a receiver station, said receiver station including a receiver, a detector, a computer, and at least one output device, said method comprising the steps of:

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D Cmt, receiving one or more information transmissions containing first data and first television programming, said first television programming [being of] to be outputted for a duration of time, only a portion of said duration containing at least a first time interval of specific relevance, at least one of said first data and said first television programming being received from at least a first remote transmitter station;

selecting and delivering said first television programming to said at least one output device for output to said user;

detecting said first data before a first time period during which user specific information will be processed and delivering said first data to said computer;

generating second data to serve as a basis for delivering said user specific programming by processing at least one of said first data in said first time period;

communicating said second data to said at least one output device before the end of said first time interval of specific relevance based on said step of generating second data; and

outputting said user specific programming, said user specific programming comprising said first television programming and said second data.

Sub E18 218. (Amended) A method of processing signals at at least one receiver station, said at least one receiver station including a computer for at least one of responding to commands and controlling [the] communication of at least one of signals and information, said method comprising the steps of:

inputting at least one control instruction, said at least one control instruction controlling at least one of [the] processing and communication of at least one of



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television, radio, video, audio, data, multimedia, and computer programming, wherein said at least one control instruction includes at least one of:

(a) a switch control instruction to control operation of a switch to control [the] routing and communication of said at least one of [said] television, radio, video, audio, data, multimedia, and computer programming;

(b) a timing control instruction to control at least one of [the] timing and time of communication of said at least one of [said] television, radio, video, audio, data, multimedia, and computer programming; and

(c) a locating control instruction to at least one of control and allow [the] said computer to at least one of locate and identify said at least one of [said] television, radio, video, audio, data, multimedia, and computer programming;

receiving said at least one of [said] television, radio, video, audio, data, multimedia, and computer programming, wherein said inputted at least one control instruction provides at least one of instruction and information as to [the] processing of said received at least one of [said] television, radio, video, audio, data, multimedia, and computer programming;

storing said received at least one of [said] television, radio, video, audio, data, multimedia, and computer programming; and

storing said at least one control instruction with said at least one of [said] television, radio, video, audio, data, multimedia, and computer programming to enable [the] said computer to subsequently at least one of communicate and process said at least one of [said] television, radio, video, audio, data, multimedia, and computer programming in accordance with said at least one control instruction.

219. (Amended) The method of claim 218 further comprising the step of:

communicating said stored at least one of [said] television, radio, video, audio, data, multimedia, and computer programming in accordance with said at least one control instruction.

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220. (Amended) The method of claim 218, wherein said step of storing includes the steps of:

embedding [the] said at least one control instruction in said at least one of [said] television, radio, video, audio, data, multimedia, and computer programming; and

storing said at least one of [said] television, radio, video, audio, data, multimedia, and computer programming and [the] said embedded at least one control instruction.

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Fig.

221. (Amended) A method of processing signals at a receiver station, said receiver station including a plurality of storage locations and a receiver for receiving at least one of a broadcast transmission and a cablecast transmission, wherein each of said plurality of storage locations is capable of storing programming, and wherein said receiver station has a computer for communicating said programming selectively between each of said plurality of storage locations, said method comprising the steps of:

inputting at least one of television, radio, video, audio, data, multimedia, and computer programming;

storing said inputted at least one of [said] television, radio, video, audio, data, multimedia, and computer programming at one of said plurality of storage locations;

receiving a carrier transmission;

demodulating said carrier transmission to detect an information transmission thereon, said information transmission including at least one control instruction, wherein said at least one control instruction [is] includes one of:

- (a) a switch control instruction;
- (b) a timing control instruction; and

(c) a locating control instruction;

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Cont.  
detecting said at least one control instruction on said information transmission, said at least one control instruction providing information as to [the] processing of said stored at least one of [said] television, radio, video, audio, data, multimedia, and computer programming;

storing said at least one control instruction at said one of said plurality of storage [location] locations with said stored at least one of [said] television, radio, video, audio, data, multimedia, and computer programming enabling [the] said computer to at least one of locate, process, and communicate said at least one of [said] television, radio, video, audio, data, multimedia, and computer programming at a specific time or in a specific manner in accordance with said at least one control instruction.

222. (Amended) The method of claim 221, wherein said at least one control instruction includes [said] a locating control instruction, wherein said locating control instruction comprises an identification code identifying said at least one of [said] television, radio, video, audio, data, multimedia, and computer programming stored with said identification code at said one of said plurality of storage [location] locations.

223. (Amended) A method of processing signals at a receiver station, said receiver station including at least one of a television receiver, a radio receiver, a telephone receiver, and a data receiver for receiving an information transmission including programming, said programming including at least one of television programming, radio programming, video programming, audio programming, data programming, multimedia programming, and computer programming, wherein said receiver station also includes a storage location for storing said programming, said method comprising the steps of:

inputting and storing at least one control instruction including at least one of:

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Cmt.
- (1) an instruction to contact a remote telephone unit;
  - (2) an instruction to look for a signal in a predetermined fashion;
  - (3) an instruction to erase information in a recorder;
  - (4) an instruction to decrypt a signal in a specific fashion;
  - (5) an instruction to identify a signal;
  - (6) an instruction to pass a signal externally;
  - (7) an instruction to identify where to pass a signal;
  - (8) an instruction to discard a signal;
  - (9) an instruction to mark a signal;
  - (10) an instruction to assemble a signal string;
  - (11) an instruction to configure a switch;
  - (12) an instruction to transfer a signal;
  - (13) an instruction to store a signal;
  - (14) an instruction to remove a signal;
  - (15) an instruction to add a signal;
  - (16) an instruction to decrypt a signal;
  - (17) an instruction not to decrypt a signal;
  - (18) an instruction to interrupt a signal;
  - (19) an instruction not to interrupt a signal;
  - (20) an instruction informing how to decrypt a signal;
  - (21) an instruction informing how to interrupt a signal;
  - (22) an instruction to turn on an apparatus;
  - (23) an instruction to tune an apparatus;
  - (24) an instruction to hold a signal;
  - (25) an instruction to monitor a signal;
  - (26) an instruction to present a signal;
  - (27) an instruction to coordinate a signal;

- D<sup>30</sup>  
Cmt.
- (28) an instruction to generate a signal;
  - (29) an instruction to transmit a signal upon command;
  - (30) an instruction to transmit a specific signal;
  - (31) an instruction to overlay a signal;
  - (32) an instruction to process if a signal is held;

receiving at least one of a television transmission, a radio transmission, a telephone transmission, and a data transmission, wherein said at least one of [said] a television transmission, [said] a radio transmission, [said] a telephone transmission, and [said] a data transmission includes an information code and one of said at least one control instruction;

detecting said information code and said one of said at least one control instruction in said at least one of [said] a television transmission, [said] a radio transmission, [said] a telephone transmission, and [said] a data transmission, said information code designating at least one of:

- (1) said programming;
- (2) [one of a proper use and a designated] use of said programming;
- (3) a transmitter station;
- (4) [one of] said receiver station [and a receiver station apparatus] ;
- (5) a network;
- (6) a broadcast station;
- (7) at least one of a channel [and a frequency] on a cable system;
- (8) a time of transmission;
- (9) a unique identifier datum;
- (10) at least one of a source of data and a supplier of data;
- (11) at least one of [a publication, an article, a publisher,] a distributor [,] and an advertisement;

storing said detected information code and said detected at least one control instruction together at a storage location to enable a computer at said receiver station to identify and at least one of communicate and process said programming in accordance with said information code and said at least one control instruction.

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224. (Amended) A method of processing signals at a receiver station, said method comprising the steps of:

receiving at least one of television programming and radio programming;

selecting one of a plurality of storage locations;

storing said at least one of [said] television programming and [said] radio programming at said selected one of said plurality of storage locations;

storing an identification signal identifying said at least one of [said] television programming and [said] radio programming with said at least one of [said] television programming and [said] radio programming at said selected one of said plurality of storage locations;

decoding [the] said stored identification signal;

identifying said selected one of said plurality of storage locations that is storing said at least one of [said] television programming and [said] radio programming based on said step of decoding [the] said stored identification signal; and

communicating said at least one of [said] television programming and [said] radio programming from said selected one of said plurality of storage locations to a subscriber based on said step of identifying.

225. (Amended) The method of claim 224, wherein said step of communicating further comprises the step of:

communicating [the] said identification signal and said at least one of [said] television programming and [said] radio programming from said selected one of said plurality of storage locations to a subscriber in response to said step of identifying.

226. (Amended) The method of claim 225, said method further comprising the step of:

detecting [the] said identification signal communicated from [the] said receiver station to the subscriber.

227. (Amended) The method of claim 226, said method further comprising the step of:

recording information indicating that said at least one of [said] television programming and [said] radio programming was communicated based on said step of detecting [the] said identification signal.

228. (Amended) The method of claim 227, wherein said step of recording further comprises the step of:

recording information indicating:

- (1) a time when said at least one of [said] television programming and [said] radio programming was communicated; and
- (2) one of a channel and a frequency over which said at least one of [said] television programming and [said] radio programming was communicated.

229. (Unchanged) The method of claim 224, wherein said step of selecting further comprises the step of:

selecting one of a plurality of programming storage devices.

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230. (Amended) The method of claim 229, wherein said step of storing said at least one of [said] television programming and [said] radio programming further comprises the step of:

storing said at least one of [said] television programming and [said] radio programming on said selected one of said plurality of storage devices; and

storing an identification signal identifying said at least one of [said] television programming and [said] radio programming with said at least one of [said] television programming and [said] radio programming on said selected one of said plurality of storage devices.

231. (Amended) The method of claim 230, wherein said step of identifying further comprises the step of:

identifying said selected one of said plurality of storage devices that is storing said at least one of [said] television programming and [said] radio programming based on said step of decoding [the] said stored identification signal.

232. (Amended) The method of claim 231, wherein said step of communicating further comprises the step of:

communicating said at least one of [said] television programming and [said] radio programming from said selected one of said plurality of storage devices to a subscriber in response to said step of identifying said selected one of said plurality of storage devices.

233. (Amended) The method of claim 224, said method further comprising the step of:

receiving and storing a programming schedule identifying:

(1) the time when said at least one of [said] television programming and [said] radio programming should be communicated; and



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(2) at least one of the channel and the frequency over which said at least one of [said] television programming and [said] radio programming should be communicated to said subscriber.

234. (Amended) The method of claim 233, wherein said step of communicating further comprises the step of:

communicating said at least one of [said] television programming and [said] radio programming from said selected one of said plurality of storage locations to said subscriber in response to said step of identifying and in accordance with said programming schedule.

235. (Amended) The method of claim 224, said method further comprising the step of:

receiving and detecting a signal instructing [the] said receiver station to communicate said at least one of [said] television programming and [said] radio programming to said subscriber, wherein said steps of decoding, identifying and communicating are performed in response to said step of receiving and detecting [the] said instructing signal.

236. (Amended) The method of claim 224, wherein said step of receiving further comprises the step of:

receiving and demodulating a carrier transmission including said at least one of [said] television programming and [said] radio programming.

237. (Amended) The method of claim 224, wherein said step of receiving further comprises the step of:

loading a prerecorded portion of said at least one of [said] television programming and said radio programming onto a programming storage/playing device at the receiver station.

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238. (Amended) A method of processing signals at a receiver station, said method comprising the steps of:

receiving at least one of television programming and radio programming;

selecting one of a plurality of storage locations;

storing said at least one of [said] television programming and [said] radio programming at said selected one of said plurality of storage locations;

storing information identifying said selected one of said plurality of storage locations that is storing said at least one of [said] television programming and [said] radio programming;

decoding [the] said stored information;

identifying said selected one of said plurality of storage locations that is storing said at least one of [said] television programming and [said] radio programming based on said step of decoding [the] said stored information; and

communicating said at least one of [said] television programming and [said] radio programming from said selected one of said plurality of storage locations to a subscriber in response to said step of identifying.

239. (Amended) The method of claim 238, wherein said step of storing information further comprises the step of:

storing information identifying at least one of [the] a distance and [the] a storage location of the beginning of said at least one of [said] television programming and [said] radio programming.

240. (Amended) The method of claim 238, wherein said step of storing information further comprises the step of:

storing information identifying:

- D31  
Gmt.
- (1) at least one of [the] a distance and [the] a storage location of the beginning of said at least one of [said] television programming and [said] radio programming; and
  - (2) at least one of [the] a distance and [the] a storage location of the end of said at least one of [said] television programming and [said] s radio programming.

241. (Amended) The method of claim 238, said method further comprising the step of:

embedding an identification signal identifying said at least one of [said] television programming and [said] radio programming in said at least one of [said] television programming and [said] radio programming, wherein said stored information includes said embedded identification signal, and wherein said step of storing information includes the step of storing said at least one of [said] television programming and [said] radio programming with [the] said embedded identification signal at said selected one of said plurality of storage locations.

242. (Amended) A method of processing signals at a receiver station, said method comprising the steps of:

receiving at least one of television programming and radio programming with an identification signal;

embedding [the] said identification signal in said received at least one of [said] television programming and [said] radio programming;

selecting one of a plurality of storage locations;

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storing said at least one of [said] television programming and [said] radio programming with [the] said embedded identification signal at said selected one of said plurality of storage locations;

receiving and storing a programming schedule designating when and on what channel or frequency said at least one of [said] television programming and [said] radio programming should be communicated to a subscriber;

decoding [the] said stored identification signal;

identifying said selected one of said plurality of storage locations that is storing said at least one of [said] television programming and [said] radio programming based on said step of decoding [the] said stored identification signal;

configuring a switch to allow [the] communication of said at least one of [said] television programming and [said] radio programming from said selected one of said plurality of storage locations to the subscriber according to said programming schedule; and

communicating said at least one of [said] television programming and [said] radio programming from said selected one of said plurality of storage locations to the subscriber via said switch according to said programming schedule.

243. (Amended) The method of claim 242, said method further comprising the steps of:

detecting [the] said embedded identification signal in said at least one of [said] television programming and [said] radio programming communicated from [the] said receiver station to the subscriber during said step of [communication] communicating; and

recording information indicating that said at least one of [said] television programming and [said] radio programming was communicated based on said step of detecting [the] said embedded identification signal.

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244. (Amended) An apparatus located at a receiver station for processing signals, said apparatus comprising:

- a programming storage device for storing at least one of radio programming and television programming;
- an input device for inputting said at least one of [said] radio programming and [said] television programming;
- a signal detector operatively connected to said programming storage device for detecting signals stored in said programming storage device;
- a communicator, operatively connected to said programming storage device, for communicating said at least one of [said] radio programming and [said] television programming and other information to a subscriber;
- a computer operatively connected to [the] said input device, [the] said signal detector and [the] said communicator, wherein said computer is programmed to perform the following steps:
  - (a) receiving said at least one of [said] radio programming and [said] television programming from [the] said input device;
  - (b) receiving information identifying said received at least one of [said] radio programming and [said] s television programming;
  - (c) selecting one of a plurality of storage locations on [the] said programming storage device;
  - (d) outputting said received at least one of [said] radio programming and [said] television programming to [the] said programming storage device and controlling [the] said programming storage device to store said outputted at least one of [said] radio programming and [said] television programming at [the] said selected storage location of [the] said programming storage device;

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(e) outputting the information identifying said at least one of [said] radio programming and [said] television programming to [the] said programming storage device and controlling [the] said programming storage device to store the information with said stored at least one of [said] radio programming and [said] television programming at [the] said selected storage location;

(f) causing [the] said signal detector to detect the identifying information stored on [the] said programming storage device;

(g) determining [the] said selected storage location of said stored at least one of [said] radio programming and [said] television programming based on said step (f);

(h) controlling [the] said programming storage device to output said stored at least one of [said] radio programming and [said] television programming from [the] said selected storage location to [the] said communicator; and

(i) controlling [the] said communicator to communicate said at least one of [said] radio programming and [said] television programming to said subscriber.

245. (Amended) The apparatus of claim 244, wherein said input device further comprises:

a receiver for receiving and demodulating a carrier transmission including said at least one of [said] radio programming and [said] television programming.

246. (Amended) The apparatus of claim 245, said apparatus further comprising:

a second detector operatively connected to [the] said receiver and [the] said computer for detecting signals in said carrier transmission.

247. (Amended) The apparatus of claim 246, wherein said second detector detects a signal instructing [the] said computer to store said received at least one of [said]

radio programming and [said] television programming, and wherein said computer performs at least one of said steps (c) - (e) in response to said second detector detecting said signal instructing [the] said computer to store said received at least one of [said] radio programming and [said] television programming.

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248. (Amended) The apparatus of claim 246, wherein said second detector detects a signal instructing [the] said computer to communicate said stored at least one of [said] radio programming and [said] television programming to the subscriber, and wherein said computer performs at least one of said steps (f) - (i) in response to said second detector detecting said signal instructing [the] said computer to communicate.

249. (Amended) The apparatus of claim 244, said apparatus further comprising a programming storage/playback device for receiving one of tapes and discs containing prerecorded portions of said at least one of [said] radio programming and [said] television programming.

250. (Amended) The apparatus of claim 244, wherein said programming storage device further comprises a plurality of programming storage devices, and wherein said step (c) further comprises the step of:

selecting a first one of said plurality of programming storage devices for storing said received at least one of [said] radio programming and [said] television programming.

251. (Amended) The apparatus of claim 250, said apparatus further comprising:

a switch operatively connected between said plurality of programming storage devices and [the] said communicator for selectively connecting a second one of said

plurality of storage devices to [the] said communicator, and wherein said computer is programmed to further perform the step of:

one of configuring and controlling [the] said switch to connect said second one of said plurality of storage devices to [the] said communicator to allow said at least one of [said] radio programming and [said] television programming to be communicated to the subscriber.

252. (Amended) The apparatus of claim 244, said apparatus further comprising:

a programming schedule input device operatively connected to said computer for:

(a) one of receiving and inputting a programming schedule, said programming schedule designating at least one of a time [and] , a channel and a frequency for communicating said stored at least one of [said] radio programming and [said] television programming, wherein said computer performs said steps (f) - (i) in response to said programming schedule; and

(b) controlling said communicator to communicate said at least one of [said] radio programming and [said] television programming over said at least one of [said] a time [and said] , a channel and [said] a frequency designated by said programming schedule.

253. (Unchanged) The method of claim 244, wherein said computer further comprises said signal detector.

254. (Amended) A method of controlling a plurality of receiver stations each of which includes a television receiver, a signal detector, and a processor, wherein each of said plurality of receiver stations is adapted to detect the presence of at least one control



signal and programmed to process downloadable code, said method comprising the steps of:

[(1)] receiving, at a transmitter station, at least a portion of said downloadable code which is effective to store a control instruction for subsequent processing and use with at least one of television programming, radio programming, video programming, audio programming, data programming, multimedia programming, and computer programming, wherein said downloadable code has a target processor to process data at each of said plurality of receiver stations;

[(2)] transferring said downloadable code to a transmitter;

[(3)] receiving said at least one control signal at said transmitter station, wherein said at least one control signal operates to execute said downloadable code; and

[(4)] transferring said at least one control signal from said transmitter station to said transmitter, and transmitting at least one information transmission including said downloadable code and said at least one control signal.

255. (Amended) A method of communicating subscriber station information from a subscriber station to at least one remote data collection station, said subscriber station including a processor for processing at least one instruct signal, said method comprising the steps of:

[(1)] inputting a subscriber reaction at a subscriber station;

[(2)] receiving, at said subscriber station, information that designates at least one of:

(a) said at least one instruct signal to process; and

(b) an output to deliver in consequence of said inputted subscriber reaction;

[(3)] determining the presence of said inputted subscriber reaction at said subscriber station by processing said inputted subscriber reaction;

[[4]] processing said at least one instruct signal which is effective to store a control instruction for subsequent processing and use with at least one of television programming, radio programming, video programming, audio programming, data programming, multimedia programming, and computer programming at said subscriber station in consequence of said step of determining; and

[[5]] transferring, from said subscriber station to said at least one remote data collection station, at least one datum that confirms at least one of:

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D<sub>Conf</sub>
- (a) delivery of said at least one instruct signal from said step of processing;
  - and
  - (b) delivery of said effect from said step of processing.

256. (Amended) A method of gathering information on the use of at least one of a resource and a control signal at a receiver station, said receiver station having a processor, and a controlled device, and wherein said receiver station transfers said gathered information to a remote station, said method comprising the steps of:

[[1]] identifying said at least one of [said] a resource and [said] a control signal which is effective to store a control instruction for subsequent processing and use with at least one of television programming, radio programming, video programming, audio programming, data programming, multimedia programming, and computer programming;

[[2]] monitoring said at least one of [said] a resource and [said] a control signal;

[[3]] storing a record of [the] use of said at least one of [said] a resource and [said] a control signal from said step of monitoring; and

[[4]] communicating information on said use of said at least one of [said] a resource and [said] a control signal from said step of storing a record from said receiver station to a remote station.

257. (Amended) A method of controlling a network including a remote intermediate data transmitter station and at least one receiver station, wherein said remote intermediate data transmitter station includes at least one of a broadcast transmitter and a cablecast transmitter for transmitting at least one instruct signal which is effective at said at least one receiver station to instruct one of a computer and a processor, a plurality of selective transfer devices each operatively connected to said at least one of [said] a broadcast transmitter and [said] a cablecast transmitter for communicating data, a data receiver for receiving said data from at least one origination transmitter, a control signal detector, and one of a controller and a computer capable of controlling at least one of said plurality of selective transfer devices, and wherein said remote intermediate data transmitter station is adapted to detect the presence of at least one control signal that controls [the] communication of said at least one instruct signal, and to deliver at said at least one of [said] a broadcast transmitter and [said] a cablecast transmitter said at least one instruct signal, said method comprising the steps of:

[(1)] receiving said at least one instruct signal to be transmitted by [the] said remote intermediate data transmitter station and delivering said at least one instruct signal to said at least one origination transmitter, wherein said at least one instruct signal is effective in said network to store at least one control instruction for subsequent processing and use with at least one of television programming, radio programming, video programming, audio programming, data programming, multimedia programming, and computer programming;

[(2)] receiving said at least one control signal which at the remote intermediate data transmitter station operates to control [the] communication of said at least one instruct signal; and

[(3)] transmitting said at least one control signal from said at least one origination transmitter before a specific time.

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258. (Amended) A method of controlling a remote transmitter station to deliver a receiver specific output at a receiver station and controlling said receiver station to communicate at least one receiver specific datum to a remote data collection station, wherein said receiver station is remote from said remote transmitter station and said remote data collection station is remote from said receiver station, said method comprising the steps of:

[(1)] receiving, at [the] said remote transmitter station, at least one instruct signal which operates at the receiver station to:

(a) store a control instruction for subsequent processing and use with at least one of television programming, radio programming, video programming, audio programming, data programming, multimedia programming, and computer programming; and

(b) at least one of assemble and communicate said at least one receiver specific datum to said remote data collection station;

[(2)] receiving at least one control signal which operates at [the] said remote transmitter station to control [the] communication of said at least one instruct signal and communicating said at least one control signal to said remote transmitter station;

[(3)] receiving at least one of a code and a datum designating a specific one of said at least one instruct signal to be transmitted by [the] said remote transmitter station, and wherein said transmitter station transfers said designated specific one of said at least one instruct signal to a transmitter; and

[(4)] transmitting from said remote transmitter station an information transmission including at least one designated instruct signal, wherein said at least one designated instruct signal is transmitted at at least one specific time or on at least one specific channel in accordance with said at least one control signal.

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259. (Amended) A method of processing signals at a receiver station to deliver an output to at least one of complete and supplement mass medium programming, said receiver station having a processor, a storage device, and at least one output device, wherein at least one of said at least one output device is adapted to output said mass medium programming, said method comprising the steps of:

[(1)] receiving said mass medium programming at said receiver station from a mass medium programming source and outputting said mass medium programming at said at least one output device, said at least one output device adapted to output said mass medium programming;

[(2)] receiving one of a broadcast information transmission and a cablecast information transmission at said receiver station, wherein said one of [said] a broadcast information transmission and [said] a cablecast information transmission includes at least one instruct signal to direct said at least one output device to at least one of complete and supplement said mass medium programming;

[(3)] detecting said at least one instruct signal in said one of [said] a broadcast information transmission and [said] a cablecast information transmission and passing said detected at least one instruct signal to a processor; and

[(4)] controlling said processor based on said detected at least one instruct signal, said step of controlling further comprising the steps of:

(a) storing a control instruction for subsequent processing and use to at least one of complete and supplement said mass medium programming; and

(b) directing said output to at least one of complete and supplement said mass medium programming to said at least one output device in consequence of said control instruction.

260. (Amended) A method of controlling at least one of a plurality of receiver stations each of which includes a mass medium programming receiver, a signal

detector, one of at least one computer and at least one processor, wherein each of said at least one of said plurality of receiver stations is adapted to detect the presence of at least one control signal and to input a subscriber reaction to a specific offer communicated in mass medium programming, said method comprising the steps of:

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[(1)] receiving at least one instruct signal at a transmitter station and delivering said at least one instruct signal to a transmitter, wherein said at least one instruct signal is effective at said at least one of said plurality of receiver stations to store a control instruction for subsequent processing and use with at least one of television programming, radio programming, video programming, audio programming, data programming, multimedia programming, and computer programming;

[(2)] receiving at least one of a code and a datum at said transmitter station, wherein said at least one of [said] a code and [said] a datum designates at least one of said control instruction and said subscriber reaction to said offer;

[(3)] receiving said at least one control signal at said transmitter station, wherein said at least one control signal operates at said at least one of said plurality of receiver stations to execute said control instruction for processing and use with said at least one of [said] television programming, [said] radio programming, [said] video programming, [said] audio programming, [said] data programming, [said] multimedia programming, and [said] computer programming;

[(4)] transferring said at least one of [said] a code and [said] a datum and said at least one control signal to said transmitter at said transmitter station at a specific time; and

[(5)] transmitting said at least one instruct signal, said at least one of [said] a code and [said] a datum, and said at least one control signal from said transmitter station.

261. (Unchanged) A method of generating and embedding signals to control a presentation, said method comprising the steps of:

receiving programming that contains video information;

receiving an instruction, said instruction designating supplemental programming material and having effect at a receiver station to store a control instruction for subsequent processing and use with said programming;

embedding said instruction, said step of embedding translating said instruction to a control signal, wherein said control signal directs an ancillary processor to perform the coordination of said supplemental programming material indicated by said instruction with said programming; and

storing said control signal from said step of embedding, said control signal stored in conjunction with said programming, wherein said supplemental programming material and said ancillary processor are operative to store said control instruction for subsequent processing and use with at least one of television programming, radio programming, video programming, audio programming, data programming, multimedia programming, and computer programming, wherein said method generates and embeds said signals.

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262. (Amended) ~~A method of controlling at least one of a plurality of receiver stations each of which includes one of a broadcast mass medium programming receiver and a cablecast mass medium programming receiver, at least one output device, a control signal detector, and at least one processor capable of responding to at least one instruct signal, wherein each of said plurality of receiver stations is adapted to detect and respond to said at least one instruct signal, said method comprising the steps of:~~

~~receiving, at one of a broadcast transmitter station and a cablecast transmitter station, said at least one instruct signal which is effective at said at least one of said plurality of receiver stations to store a control instruction for subsequent processing and use with at least one of television programming, radio programming, video programming, audio programming, data programming, multimedia programming, and computer programming;~~

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delivering said at least one instruct signal to a transmitter;  
receiving, at said one of [said] a broadcast transmitter station and [said] a cablecast transmitter station, at least one control signal which at said at least one of said plurality of receiver stations operates to communicate at least one of said at least one instruct signal and said control instruction to a specific processor; and  
transferring said at least one control signal to the transmitter, wherein said transmitter transmits said at least one instruct signal and said at least one control signal.

263. (Amended) A method of communicating one of television signals and radio signals in a network including an origination station that transmits signals, at least one intermediate station that receives and selectively transmits signals, and a subscriber station that receives signals from said at least one intermediate station, said method comprising the steps of:

storing one of television programming and radio programming at a first storage location in said network, said one of [said] television programming and [said] radio programming including at least audio;

transferring, under computer control, said one of [said] television programming and [said] radio programming from [the] said first storage location to a second storage location at a selected one of said at least one intermediate station;

storing said one of [said] television programming and [said] radio programming at [the] said second storage location to enable [the] said selected one of said at least one intermediate station to communicate [the] said stored one of [said] television programming and [said] radio programming from [the] said second storage location to a subscriber station;

communicating a programming identification signal from [the] said origination station to [the] said selected one of said at least one intermediate station, said



programming identification signal identifying said one of [said] television programming and [said] radio programming stored at [the] said second storage location;

detecting, at [the] said selected one of said at least one intermediate station, said programming identification signal communicated from [the] said origination station;

communicating said one of [said] television programming and [said] radio programming identified by [the] said programming identification signal from [the] said second storage location to [the] said subscriber station based on said step of detecting said programming identification signal.

264. (Amended) The method of claim 263, wherein said step of storing said one of [said] television programming and [said] radio programming at [the] said second storage location further comprises the steps of:

identifying said one of [said] television programming and [said] radio programming;

storing said one of [said] television programming and [said] radio programming in a file with identification information identifying said one of [said] television programming and [said] radio programming at [the] said second storage location to enable [the] subsequent identification of said stored one of [said] television programming and [said] radio programming.

265. (Amended) The method of claim 264, wherein said step of storing said one of [said] television programming and [said] radio programming in a file further comprises the step of:

embedding [the] said identification information in said one of [said] television programming and [said] radio programming prior to said step of storing said one of television programming and [said] radio programming with said identification information.

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266. (Amended) The method of claim 264, wherein said step of identifying further comprises the step of:

comparing [the] said identified one of [said] television programming and [said] radio programming to previously stored information identifying a plurality of said one of [said] television programming and [said] radio programming.

267. (Amended) The method of claim 263 further comprising the step of: receiving and storing at [the] said selected one of said at least one intermediate station a programming schedule designating, for a plurality of said one of [said] television programming and [said] radio programming:

(a) a time to communicate said one of [said] television programming and [said] radio programming; and

(b) at least one of an output channel and an output frequency for communicating said one of [said] television programming and [said] radio programming to said subscriber station.

268. (Amended) The method of claim 267 further comprising the step of: comparing [the] said detected programming identification signal to [the] said stored programming schedule to determine at least one of a time and a channel and a frequency for communicating said stored one of [said] television programming and [said] radio programming.

269. (Amended) The method of claim 268, wherein said step of communicating further comprises the step of:

communicating said one of [said] television programming and [said] radio programming identified by [the] said programming identification signal from [the] said second storage location to [the] said subscriber station:

- (a) in response to detecting [the] said programming identification signal; and  
(b) in accordance with said programming schedule based on said step of comparing.

270. (Amended) The method of claim 263 further comprising the step of: receiving said one of [said] television programming and [said] radio programming from a remote location.

271. (Amended) The method of claim 263, wherein said step of storing said one of [said] television programming and [said] radio programming at [the] said first storage location further comprises the step of:

loading said one of [said] television programming and [said] radio programming on a programming storage device.

272. (Amended) The method of claim 271, wherein said step of loading further comprises:

loading a tape containing pre-recorded material including said one of [said ] television programming and [said ] radio programming onto a video tape player/recorder.

273. (Amended) The method of claim 271, wherein said step of loading further comprises:

at least one of loading and storing [the] said one of television programming and radio programming on a video disk storage unit.

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274. (Amended) The method of claim 263, wherein said step of storing said one of [said] television programming and [said] radio programming at [the] said first storage location further comprises the steps of:

receiving said one of [said] television programming and [said] radio programming at [the] said selected one of said at least one intermediate station;

selecting a first storage location at [the] said one of said at least one selected intermediate station; and

storing said one of [said] television programming and [said] radio programming at the selected first storage location at said one of said at least one intermediate station.

275. (Amended) The method of claim 263, wherein said step of storing at a storage location in said network further comprises the steps of:

receiving said one of [said] television programming and [said] radio programming at [the] said selected one of said at least one intermediate station;

selecting a first of a plurality of storage devices at [the] said selected one of said at least one intermediate station;

storing said one of [said] television programming and [said] radio programming on [the] said first of said plurality of storage devices.

276. (Amended) The method of claim 275, wherein said step of transferring further comprises the steps of:

selecting a second of [the] said plurality of storage devices at [the] said selected one of at least one intermediate station; and

transferring, under computer control, said one of [said] television programming and [said] radio programming from [the] said first of said plurality of storage devices to a second storage location at [the] said selected one of at least one intermediate station.

277. (Amended) The method of claim 276, wherein said step of storing said one of [said ] television programming and [said ] radio programming at [the] said second storage location further comprises the step of:

storing said one of [said ] television programming and [said ] radio programming at [the] said second of said plurality of storage devices to enable [the] said selected one of at least one intermediate station to communicate said stored one of [said ] television programming and [said ] radio programming from [the] said second of said plurality of storage [device] devices to [the] said subscriber station.

278. (Amended) The method of claim 277, wherein said step of communicating said one of [said ] television programming and [said ] radio programming further comprises the step of:

communicating said one of [said ] television programming and [said ] radio programming identified by [the] said programming identification signal from [the] said second of said plurality of storage devices to [the] said subscriber station based on detecting [the] said programming identification signal.

279. (Amended) The method of claim 263 further comprising:  
logging said step of communicating said one of [said ] television programming and [said ] radio programming.

280. (Amended) The method of claim 263, wherein said step of communicating said one of [said ] television programming and [said ] radio programming further comprises the step of:

communicating identification information identifying said one of [said ] television programming and [said ] radio programming with said one of [said ] television

programming and [said ] radio programming from [the] said second storage location to [the] said subscriber station.

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281. (Amended) The method of claim 280 further comprising the step of:  
logging [the] said step of communicating said one of [said ] television  
programming and [said ] radio programming to [the] said subscriber station.

282. (Amended) The method of claim 281, wherein said step of logging  
comprises the steps of:

detecting said identification information communicated from [the] said second  
storage location during said step of communicating said one of [said ] television  
programming and [said ] radio programming;

recording information indicating that said one of [said ] television programming  
and [said ] radio programming was communicated to [the] said subscriber station based  
on said step of detecting [the] said identification information.

283. (Amended) A method of communicating one of television signals and  
radio signals in a network including a plurality of stations, said plurality of stations  
including an origination station that transmits signals, at least one intermediate station  
that receives and selectively transmits signals, a plurality of storage devices, and a  
plurality of subscriber stations that receives signals from said at least one intermediate  
station, said method comprising the steps of:

storing one of television programming and radio programming at a first storage  
location at a first [one] station of said plurality of stations in said network, said one of  
[said ] television programming and [said ] radio programming including at least audio;

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transferring, under computer control, said one of [said ] television programming and [said ] radio programming from [the] said first storage location of the first station to a second storage location of a second one of the plurality of stations of [the] said network;

storing said one of [said ] television programming and [said ] radio programming at [the] said second storage location to enable selective transmission of said one of [said ] television programming and [said ] radio programming from [the] said second station to a third [one] station of said plurality of stations.

284. (Amended) The method of claim 283, wherein at least one of said first station and said second station includes a selected intermediate station, said first storage location and said second storage location including first and second storage locations at [the] said selected intermediate station, said method further comprising the steps of:

communicating a programming identification signal from [the] said origination station to [the] said selected intermediate station, said programming identification signal identifying said one of [said ] television programming and [said ] radio programming stored at [the] said second storage location;

detecting, at [the] said selected intermediate station, [the] said programming identification signal communicated from [the] said origination station;

communicating said one of [said ] television programming and [said ] radio programming identified by [the] said programming identification signal from [the] said second storage location to at least one of said plurality of subscriber stations in response to detecting [the] said programming identification signal.

285. (Amended) The method of claim 284 further comprising the step of:  
logging that said one of [said ] television programming and [said ] radio programming was communicated from [the] said second storage location to at least one of said plurality of subscriber stations.

286. (Amended) The method of claim 285, wherein said step of logging further comprises the steps of:

detecting embedded identification data in [the] said communicated one of [said ] television programming and [said ] radio programming; and

recording information indicating that said one of [said ] television programming and [said ] radio programming was communicated based on said step of detecting.

287. (Amended) The method of claim 283, wherein said step of storing at [the] said second storage location further comprises the steps of:

identifying said one of [said ] television programming and [said ] radio programming;

embedding identification data in said one of [said ] television programming and [said ] radio programming, said identification data identifying said one of [said ] television programming and [said ] radio programming;

storing said one of [said ] television programming and [said ] radio programming with [the] said embedded identification data at [the] said second storage location; and

enabling [the ] communication of [the] said one of [said ] television programming and [said ] radio programming from [the] said second station to [the] said third [one] station of said plurality of stations.

288. (Amended) The method of claim 283, wherein said step of storing at a first storage location includes storing a first unit and a second unit of said one of [said ] television programming and [said ] radio programming on a first of said plurality of storage devices, said step of storing said one of [said ] television programming and [said ] radio programming at a second storage location further comprising the steps of:



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- (a) reordering said first unit and second unit [one of said television programming and said radio programming ] into a new order; and
  - (b) storing said first unit and second unit [one of said television programming and said radio programming ] on a second of said plurality of storage devices in [the] said new order.

289. (Amended) A network of stations comprising:

an origination station including a transmitter for transmitting one of television programming and radio programming with programming identification signals, said one of [said ] television programming and [said ] radio programming including at least audio;

a plurality of intermediate stations for receiving, processing and selectively retransmitting said one of [said ] television programming and [said ] radio programming with [the] said programming identification signals received from [the] said origination station, each of said plurality of intermediate stations including:

- (a) a receiver for receiving said one of [said ] television programming and [said ] radio programming with [the] said programming identification signals from [the] said origination station;

- (b) a signal detector for detecting [the] said programming identification signals;

- (c) a plurality of programming storage devices for storing said one of [said ] television programming and [said ] radio programming;

- (d) a computer operatively connected to said receiver, said signal detector and said plurality of programming storage devices, said computer programmed to perform the following steps:

- (1) identifying said one of [said ] television programming and [said ] radio programming received by said receiver based on [the] said programming identification signal detected by said signal detector;

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- (2) routing [the] said identified one of [said ] television programming and [said ] radio programming to a first of said plurality of programming storage devices;
- (3) controlling [the] said first of said plurality of programming storage devices to store [the] said identified one of [said ] television programming and [said ] radio programming on [the] said first of said plurality of programming storage devices;
- (4) transferring [the] said identified one of [said ] television programming and [said ] radio programming from [the] said first of said plurality of programming storage devices to a second of said plurality of programming storage devices;
- (5) controlling [the] said second of said plurality of programming storage devices to store [the] said identified one of [said ] television programming and [said ] radio programming on [the] said second of said plurality of programming storage devices; and
- (6) communicating [the] said identified one of [said ] television programming and [said ] radio programming from [the] said second of said plurality of programming storage devices to a subscriber station; and
- [the] said subscriber station including a receiver for receiving programming and signals.

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290. (Amended) A network of stations comprising:

an origination station including a transmitter for transmitting one of television programming and radio programming with programming identification signals, said one of [said] television programming and [said] radio programming including at least audio;

a plurality of intermediate stations for receiving, processing and selectively retransmitting said one of [said ] television programming and [said ] radio programming with the programming identification signals received from [the] said origination station, each of said plurality of intermediate stations including:

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- (a) a receiver for receiving said one of [said ] television programming and [said ] radio programming with the programming identification signals from [the] said origination station;
  - (b) a signal detector for detecting the programming identification signals;
  - (c) a plurality of programming storage devices for storing said one of [said ] television programming and [said ] radio programming;
  - (d) a computer operatively connected to said receiver, said signal detector and said plurality of programming storage devices, said computer programmed to perform the following steps:
    - (1) selecting said one of [said ] television programming and [said ] radio programming received by said receiver based on the programming identification [signal] signals detected by said signal detector;
    - (2) routing the selected one of [said ] television programming and [said ] radio programming to a first of said plurality of programming storage devices;
    - (3) controlling [the] said first of said plurality of programming storage devices to store the selected one of [said ] television programming and [said ] radio programming on [the] said first of said plurality of programming storage devices;
    - (4) transferring the selected one of [said ] television programming and [said ] radio programming from [the] said first of said plurality of programming storage devices to a second of said plurality of programming storage devices;
    - (5) controlling [the] said second of said plurality of programming storage devices to store the selected one of [said ] television programming and [said ] radio programming on [the] said second of said plurality of programming storage devices; and
    - (6) communicating the selected one of [said ] television programming and [said ] radio programming from [the] said second of said plurality of programming storage devices to a subscriber station; and
- the subscriber station comprising a receiver for receiving programming.

291. (Unchanged) A method of controlling the receipt and processing at a receiver station of mass medium programming, said receiver station including a receiver and a processor, said method comprising the steps of:

receiving, at said receiver, identification signals that identify specific signal content for at least one of a plurality of concurrent one of broadcast signal transmissions and cablecast signal transmissions;

providing a comparison signal to said processor;

comparing said comparison signal to said received identification signals and generating a control signal identifying a desired one of said plurality of concurrent one of broadcast signal transmissions and cablecast signal transmissions;

tuning the receiver, based on the generated control signal, to receive said desired one of said plurality of concurrent one of broadcast signal transmissions and cablecast signal transmissions; and

performing one of:

(1) responding to an instruct signal detected in said desired signal transmission which is effective to control communication of the mass medium programming;

(2) selecting and storing at least one datum received in said desired signal transmission, said at least one datum in respect of the mass medium programming; and

(3) controlling one of the receiver and a selective transfer device to communicate to one of an output device and a storage device a portion of the mass medium programming received in said desired one of said plurality of concurrent one of broadcast signal transmissions and cablecast signal transmissions.

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292. (Amended) A method of controlling a network including a remote intermediate mass medium programming transmitter station and at least one receiver

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station, with said remote intermediate mass medium programming transmitter station including one of a broadcast transmitter and a cablecast transmitter for transmitting mass medium programming, a plurality of selective transfer devices each operatively connected to said one of said broadcast transmitter and said cablecast transmitter for communicating said mass medium programming, a mass medium programming receiver for receiving said mass medium programming from at least one origination transmitter, a control signal detector, and one of a controller and a computer capable of controlling at least one of said plurality of selective transfer devices, and with said remote intermediate mass medium programming transmitter station adapted to detect the presence of at least one control signal, to control [the] communication of said mass medium programming in response to said at least one control signal, and to deliver at [its] said one of [said] a broadcast transmitter and [said] a cablecast transmitter said mass medium programming, said method comprising the steps of:

[(1)] receiving said mass medium programming to be transmitted by [the] said remote intermediate mass medium programming transmitter station and delivering said mass medium programming to said at least one origination transmitter, said mass medium programming having at least one of a code and a datum which is operative to identify and control communication of said mass medium programming in said network;

[(2)] receiving said at least one control signal which at [the] said remote intermediate mass medium programming transmitter station operates to control [the] communication of said mass medium programming; and

[(3)] transmitting said at least one control signal from said at least one origination transmitter before a specific time.

293. (Amended) A method of communicating programming to at least one receiver station, [each of] said at least one receiver station including one of a broadcast programming receiver and a cablecast programming receiver, an output device, a control

signal detector, a processor operably connected to said output device, and with [each] said at least one receiver station adapted to detect and respond to at least one instruct signal, said method of communicating comprising the steps of:

[(1)] receiving [the] said programming to be transmitted at a transmitter station and delivering said programming to a transmitter;

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[(2)] receiving and storing said at least one instruct signal at said transmitter station, said at least one instruct signal at the at least one receiver station operating to identify and control communication of said programming;

[(3)] transferring said at least one instruct signal to said transmitter; and

[(4)] transmitting from said transmitter station an information transmission including said programming and said at least one instruct signal.

294. (Amended) An interactive method for data promotion and delivery for use with an interactive mass medium programming output apparatus comprising the steps of:

outputting mass medium programming that promotes a specific fashion of presenting data, said interactive mass medium programming output apparatus having an input device to receive input from a subscriber;

prompting said subscriber during said mass medium programming whether said subscriber wants data presented in said specific fashion promoted in said step of [displaying] outputting, said interactive mass medium programming output apparatus having an output device for outputting said data presented in said specific fashion;

receiving a reply from said subscriber at said input device in response to said step of prompting said subscriber, said interactive mass medium programming output apparatus having a processor for processing said subscriber reply and controlling delivery of said data in response to instructions;

delivering instructions at said interactive mass medium programming output apparatus in response to said step of receiving the reply, said instructions controlling said interactive mass medium programming output apparatus;

processing said instructions from said step of delivering, said instructions effective to store and subsequently process said data; and

presenting said data on the basis of said instructions.

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295. (Amended) The method of claim 294, wherein information evidencing at least one of the availability, use and usage of one of said mass medium programming and said data are one of stored and communicated to a remote data collection station, said method further comprising the step of selecting evidence information that one of identifies and designates at least one of:

- (1) said mass medium programming;
- (2) a use of data;
- (3) a transmission station;
- (4) a receiver station;
- (5) a network;
- (6) a broadcast station;
- (7) a channel on a cable system;
- (8) a time of transmission;
- (9) a unique identifier datum;
- (10) one of a source and a supplier of data;
- (11) one of a distributor and an advertisement; and
- (12) an indication of [copyright] a payment obligation.

296. (Unchanged) The method of claim 294, wherein said instructions incorporate executable code, said method including the step of communicating said executable code to said processor and further comprising the step of:

receiving a signal containing said data on the basis of said executable code.

297. (Unchanged) The method of claim 294, wherein said instructions incorporate executable code, said method including the step of communicating said executable code to said processor and further comprising the step of:

actuating one of a video output device, an audio output device, and a print output device to output said data in said specific fashion on the basis of said executable code.

298. (Unchanged) The method of claim 294, wherein said instructions incorporate executable code, said method including the step of communicating said executable code to said processor and further comprising the step of:

decrypting at least a portion of said data on the basis of said executable code.

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D 299. (Amended) The method of claim 294, wherein said instructions incorporate executable code, said method including the step of communicating said executable code to said processor and further comprising the step of:  
controlling a selective transfer device to communicate said [selected specific output] data to said [selected specific] output device on the basis of said executable code.

300. (Unchanged) The method of claim 294, wherein said instructions incorporate executable code, said method including the step of communicating said executable code to said processor and further comprising the step of:

generating a receiver specific datum to present with said data on the basis of said executable code.



301. (Unchanged) The method of claim 294, wherein said instructions incorporate executable code, said method including the step of communicating said executable code to said processor and further comprising the step of:

delivering a receiver specific datum, at said interactive mass medium program output apparatus, one of simultaneously and sequentially with one of said mass medium programming and said data on the basis of said executable code.

302. (Unchanged) A method of controlling a receiver station including the steps of:

detecting one of the presence and the absence of one of a broadcast control signal and a cablecast control signal;

inputting an instruct-to-react signal to a processor based on said step of detecting; controlling said processor to output specific information in response to said step of inputting; and

processing stored data and generating a first control signal in respect of a mass medium programming presentation on the basis of information received from said processor based on said step of controlling.

303. (Unchanged) The method of claim 302, wherein a buffer is operatively connected to said processor for buffering input, said method further comprising the step of:

inputting said instruct-to-react signal directly to said processor.

304. (Unchanged) The method of claim 302, wherein said processor processes a datum designating one of a television channel and television programming, said method further comprising the step of:

controlling a tuner to tune a receiver to receive the one of said television channel and said television programming designated by said processed datum.

305. (Unchanged) The method of claim 302, wherein said processor processes a datum designating at least one specific channel of one of a multichannel cable signal and a multichannel broadcast signal, said method further comprising the step of:

controlling a tuner to tune a converter to receive the at least one specific channels designated by said processed datum.

306. (Unchanged) The method of claim 302, wherein said processor processes a datum designating one of a television channel and television programming, said method further comprising the step of:

controlling a selective transfer device to input to a control signal detector at least a portion of the one of said television channel and said television programming designated by said processed datum.

307. (Unchanged) The method of claim 302, wherein said processor processes a datum designating one of a television channel and television programming, said method further comprising the step of:

controlling a control signal detector to search for at least one control signal in the one of said television channel and said television programming designated by said processed datum.

308. (Unchanged) The method of claim 302, wherein said processor processes a datum designating one of a television channel and television programming, said method further comprising the step of:

controlling a selective transfer device to input to a computer, control signals detected in the one of said television channel and said television programming designated by said processed datum.

309. (Unchanged) The method of claim 302, wherein said processor processes a datum designating one of a television channel and television programming, said method further comprising the step of:

controlling a computer to respond to control signals detected in the one of said television channel and said television programming designated by said processed datum.

310. (Unchanged) The method of claim 302, wherein said processor processes a datum designating one of a television channel and television programming, said method further comprising the step of:

controlling a television monitor to display one of video and audio contained in the one of said television channel and said television programming designated by said processed datum.

311. (Unchanged) The method of claim 302, wherein said processor processes a datum designating one of a television channel and television programming, said method further comprising the step of:

controlling a video recorder to one of record and play one of video and audio contained in the one of said television channel and said television programming designated by said processed datum.

312. (Unchanged) The method of claim 302, wherein said processor processes a datum designating one of a television channel and television programming, said method further comprising the step of:

controlling a selective transfer device to communicate to one of a video recorder and a television monitor the one of said television channel and said television programming designated by said processed datum.

313. (Unchanged) The method of claim 302, wherein said processor processes a datum designating at least one specific channel of one of a multichannel cable signal and a multichannel broadcast signal, said method further comprising the step of:

controlling a selective transfer device to input to a control signal detector at least a portion of the at least one specific channel designated by said processed datum.

314. (Unchanged) The method of claim 302, wherein said processor processes a datum designating at least one specific channel of one of a multichannel cable signal and a multichannel broadcast signal, said method further comprising the step of:

controlling a control signal detector to search for at least one control signal in the at least one specific channel designated by said processed datum.

315. (Unchanged) The method of claim 302, wherein said processor processes a datum designating at least one specific channel of one of a multichannel cable signal and a multichannel broadcast signal, said method further comprising the step of:

controlling a selective transfer device to input to a computer, control signals detected in the at least one specific channel designated by said processed datum.

316. (Unchanged) The method of claim 302, wherein said processor processes a datum designating at least one specific channel of one of a multichannel cable signal and a multichannel broadcast signal, said method further comprising the step of:

controlling a computer to respond to control signals detected in the at least one specific channel designated by said processed datum.

317. (Unchanged) The method of claim 302, wherein said processor processes a datum designating at least one specific channel of one of a multichannel cable signal and a multichannel broadcast signal, said method further comprising the step of:

controlling a television monitor to display one of video and audio contained in the at least one specific channel designated by said processed datum.

318. (Unchanged) The method of claim 302, wherein said processor processes a datum designating at least one specific channel of one of a multichannel cable signal and a multichannel broadcast signal, said method further comprising the step of:

controlling a video recorder to one of record and play one of video and audio contained in the at least one specific channel designated by said processed datum.

319. (Unchanged) The method of claim 302, wherein said processor processes a datum designating at least one specific channel of one of a multichannel cable signal and a multichannel broadcast signal, said method further comprising the step of:

controlling a selective transfer device to communicate to one of a storage device and an output device the at least one specific channel designated by said processed datum.

D36  
Cmt.

320. (Amended) A method for identifying and communicating television programming at a television transmission station, said method comprising the steps of:  
receiving and storing schedule information that identifies a plurality of scheduled units of television programming and designates a communication schedule for each of said plurality of scheduled units of television programming;

receiving a television transmission, said transmission comprising at least a portion of said plurality of units of television programming and identification information identifying each of said received units of television programming;

storing said received units of television programming and [the] said identification information on a first storage device;

detecting said identification information stored at a first storage location on [the] said first storage device;

determining that said detected identification information identifies a scheduled unit of said plurality of scheduled units of television programming; and

communicating said scheduled unit of television programming to a subscriber.

321. (Amended) A method of communicating programming to a subscriber comprising the steps of:

receiving a unit of programming;

scheduling a time for transmitting the unit of programming and a channel or frequency for transmitting the unit of [program] programming;

encoding an identification signal in the unit of programming;

storing the unit of programming including the encoded identification signal in a first storage location;

transferring the unit of programming including the encoded identification signal to a second storage location;

storing the transferred unit of programming including the encoded identification signal in the second storage location;

transmitting the unit of programming including the encoded identification signal from the second storage location to a subscriber at the scheduled time and on the scheduled channel or frequency according to said step of scheduling; and

D36  
Amended

verifying when and on which channel or frequency [said] the unit of programming including the encoded identification signal was transmitted based on [said] the encoded identification signal.

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322. (Unchanged) The method of claim 321, further comprising the step of billing a customer based on said step of verifying.

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D37

323. (Amended) The method of claim 322, wherein said step of verifying comprises the steps of:

detecting the encoded identification signal [of said unit of programming] during said step of transmitting; and

generating a log identification when and on which channel or frequency [said] the unit of programming was transmitted.

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324. (Unchanged) The method of claim 323, wherein said step of billing comprises the step of billing a customer based on said log.

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D38

325. (Amended) The method of claim 321, wherein said step of receiving comprises the step of receiving the unit of [program] programming from a remote source via satellite, and said step of storing the unit of programming in a first storage location comprises a step of having a computer automatically store the received unit of programming in the first storage location.

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326. (Unchanged) The method of claim 321, wherein said step of receiving comprises the step of receiving a video tape or disc containing the unit of programming at a facility.

327. (Unchanged) The method of claim 321, wherein said step of scheduling comprises the steps of:

receiving information identifying when the unit of programming should be transmitted and on which channel or frequency the unit of programming should be transmitted; and

storing said information.

328. (Unchanged) The method of claim 327, wherein said step of scheduling further comprises the steps of:

receiving information identifying when the unit of programming will be received and on which channel or frequency the unit of programming will be received;

scheduling the transmission time and channel or frequency for the unit of programming after the unit of programming is received based on said information.

D<sup>39</sup> 329. (Amended) ~~The method of claim 321, wherein said step of encoding comprises using a signal generator to embed a digital identification signal in the unit of programming.~~

330. (Unchanged) The method of claim 321, wherein said step of storing the unit of programming at a first storage location comprises the step of storing the unit of programming on a first video recorder; and

said step of transferring comprises transferring the unit of programming from the first video recorder to a second video recorder; and

said step of storing the transferred unit of programming in the second storage location comprises the step of storing the transferred unit of programming on the second video recorder.



331. (Unchanged) The method of claim 330, wherein said step of transferring comprises the steps of:

outputting the stored unit of programming at the scheduled time from the second video recorder;

connecting an output of the second video recorder to the scheduled channel or frequency; and

transmitting the outputted unit of programming on the scheduled channel or frequency.

332. (Unchanged) The method of claim 331, wherein said step of connecting comprises the steps of:

configuring a switch to connect the output of the second video recorder to the scheduled channel or frequency of a modulator; and

modulating the outputted unit of programming onto the scheduled channel or frequency.

333. (Unchanged) A method of communicating programming to a subscriber comprising the steps of:

receiving a unit of programming from a remote source;

scheduling a time for transmitting the unit of programming and a channel or frequency for transmitting the unit of program;

encoding an identification signal in the unit of programming;

storing the unit of programming including the identification signal on a first video recorder;

transferring the unit of programming including the identification signal to a second video recorder;

storing the transferred unit of programming including the identification signal in the second video recorder;

outputting the stored unit of programming including the identification signal from the second video recorder at the scheduled time;

connecting an output of the second storage device to a channel modulator corresponding to the scheduled channel or frequency;

modulating the unit of programming;

transmitting the modulated unit of programming to a subscriber over a cable network;

detecting the encoded identification signal in the transmitted unit of programming; and

generating a log identifying at least the unit of programming and when and on which channel or frequency the unit of programming was transmitted.

334. (Unchanged) The method of claim 333, further comprising the step of billing a customer based on said log.

335. (Unchanged) A transmission station apparatus for communicating programming, said apparatus comprising:

a receiver for receiving an information transmission, said transmission comprising a unit of programming;

a first video recorder operationally connected to said receiver for storing the received unit of programming;

a second video recorder operationally connected to said second video recorder;

a switch operationally connected to said second video recorder;

a computer operationally connected to said video recorders and said switch;

a signal encoder operationally connected to said computer for encoding a signal into the unit of programming;

a channel modulator operationally connected to said switch for modulating the unit of programming output by said switch;

a cable network operationally connected to said modulator for transmitting the modulated unit of programming to a subscriber;

a verification circuit operationally connected to at least one of said switch and said modulator for verifying when and on which channel or frequency the modulated unit of programming is transmitted, said verification circuit comprising a signal decoder for decoding encoded signals on the modulated unit of programming;

said computer programmed to perform the following steps of:

(a) receiving and storing a programming schedule identifying when and on which channel or frequency the received modulated unit of programming should be transmitted to a subscriber;

(b) controlling the recorders to output the received modulated unit of programming from the first video recorder to the second video recorder;

(c) controlling the second video recorder to store the modulated unit of programming outputted from the first video recorder;

(d) controlling the second video recorder to output the modulated unit of programming at the scheduled time;

(e) controlling the switch to connect the output of the second video recorder to the channel modulator to modulate the outputted modulated unit of programming onto the scheduled channel or frequency and to transmit the modulated unit of programming to the subscriber over the cable network.

336. (Unchanged) The apparatus of claim 335, wherein said verification circuit comprises:

a signal decoder electrically connected to said switch for detecting an encoded signal in a unit of programming output by said switch; and  
said computer being electrically connected to said signal decoder.

337. (Unchanged) The apparatus of claim 335, wherein said verification circuit comprises a signal processor electrically connected to said modulator or said cable network, said signal processor comprising a signal decoder for decoding a signal encoded in a unit of programming, said signal processor generating a log identifying the unit of programming based on the signal encoded in the unit of programming, the log identifying at least when and on which channel or frequency the unit of programming is transmitted.

D40  
Cmt.

338. (Amended) A transmission station apparatus for communicating programming, said apparatus comprising:  
a receiver for receiving an information transmission, said transmission comprising a unit of programming;  
a first video recorder operationally connected to said receiver for storing and outputting the [received] unit of programming;  
a second video recorder operationally connected to said first video recorder, said second recorder storing the unit of programming output by said first video recorder;  
a switch operationally connected to said second video recorder;  
a computer operationally connected to said first video [recorders] recorder, said second video recorder and said switch for controlling said first video recorder to output the [received and stored] unit of programming to [the] said second video recorder and controlling [the] said second video recorder to output the unit of programming to [the] said switch;  
a signal encoder operationally connected to said computer for encoding a signal on the unit of programming;

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Cmt

a channel modulator operationally connected to said switch for modulating the unit of programming including the encoded signal output by said second video recorder through said switch;

a cable network operationally connected to said modulator for transmitting the modulated unit of programming to a subscriber; and

a verification circuit operationally connected to at least one of said switch and said modulator for verifying when and on which channel or frequency the modulated unit of programming is transmitted, said verification circuit comprising a signal decoder for decoding encoded signals on the modulated unit of programming.

339. (Amended) A method of communicating programming from a receiver station to a subscriber, said method comprising the steps of:

selecting a storage device from one of a plurality of programming storage devices;  
storing a unit of programming at a storage location on the selected storage device;  
storing information indicating that the unit of programming is stored on the selected storage device and indicating the storage location of the unit of programming on the selected storage device;

receiving a broadcast or cablecast transmission comprising an embedded signal, [said] the embedded signal identifying the unit of programming or designating [its] communication of the embedded signal to a subscriber;

detecting the embedded signal;

determining which of the plurality of programming storage devices is storing the unit of programming and the storage location of the unit of programming in response to the detected embedded signal, said step of determining being performed by a receiver station computer based upon (1) the detected signal and (2) the stored information indicating the storage device and the storage location storing the unit of programming;

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outputting, under control of the receiver station computer, the unit of programming from the selected storage device in response to said step of determining; embedding data identifying said outputted unit of programming in said outputted unit of programming; communicating information from the receiver station to a subscriber comprising the outputted unit of programming and the embedded data; detecting the embedded data in the information that is communicated from the receiver station; generating a record or log indicating that the unit of programming was communicated based on said step of detecting the embedded data.

340. (Unchanged) A method of communicating programming from a receiver station to a subscriber, said method comprising the steps of:

storing a unit of television or radio programming at a first storage device;  
transferring the unit of programming to a second storage device;  
storing the unit of programming on the second storage device;  
storing information indicating that the unit of programming has been transferred to the second storage device and that the unit of programming is now stored on the second storage device;  
storing information indicating the storage location of the unit of programming on the second storage device;  
receiving a broadcast or cablecast transmission comprising an embedded signal, said embedded signal identifying the unit of programming or designating its communication to a subscriber;  
detecting the embedded signal;  
determining which of the plurality of programming storage devices that is storing the unit and the storage location of the unit of programming in response to detecting the

embedded signal, said step of determining being performed by a receiver station computer based upon (1) the detected signal and (2) the stored information indicating the storage device storing the unit of programming and the stored information indicating the storage location of the unit of programming;

outputting, under control of the receiver station computer, the unit of programming from the second storage device in response to said step of determining;

embedding data identifying said outputted unit of programming in said outputted unit of programming;

communicating information from the receiver station to a subscriber comprising the outputted unit of programming and the embedded data;

detecting the embedded data in the information that is communicated from the receiver station;

generating a record or log indicating that the unit of programming was communicated based on said step of detecting the embedded data.

D 41 Cont,  
341. (Amended) A method of communicating subscriber station information from a subscriber station to one or more remote data collection stations, said method comprising the steps of:

receiving at a subscriber station information that designates an instruction to be processed or an output to be delivered;

receiving a [viewer's or participant's] user reaction to an output at said subscriber station;

processing an instruct signal which is effective to identify and control communication of one of a unit of television programming and an output to supplement a television program at said subscriber station in response to said [viewer or participant's] user reaction at said subscriber station, said processing at said subscriber station directed by instructions from said instruct signal;

generating an indicium that said instruct signal was delivered or confirming  
[delivery of said effect from said step of processing] identification and control of said one  
of a unit of television programming and an output;

transferring said indicium from said subscriber station to one or more remote data  
collection stations.

D41  
Cmt.

342. (Amended) A method of controlling a network comprising a remote  
intermediate television transmitter station and one or more receiver stations, with said  
remote intermediate television transmitter station including a broadcast or cablecast  
transmitter for transmitting one or more first units of television programming, a plurality  
of selective transfer devices each operatively connected at least some of the time to said  
broadcast or cablecast transmitter for communicating said one or more first units of  
television programming, a television receiver, a control signal processor, and a controller  
or computer capable of controlling one or more of said plurality of selective transfer  
devices, and with said remote transmitter station adapted to process one or more control  
signals, to control the communication of said one or more first units of television  
programming in response to said one or more control signals, and to deliver at said  
broadcast or cablecast transmitter said one or more first units of television programming,  
said method comprising the steps of:

receiving said one or more first units of television programming to be transmitted  
by said remote intermediate television transmitter station and delivering said one or more  
first units of television programming to one or more origination transmitters, said one or  
more first units of television programming having one or more first codes or data to  
identify and control communication of said one or more first units of television  
programming;



D41 Amdd  
receiving said one or more control signals which at said remote intermediate television transmitter station operate to control [the] communication of said one or more first units of television programming based on said one or more first codes or data; and transmitting said one or more control signals from said one or more origination transmitters before a specific time.

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343. (Unchanged) The method of claim 342, wherein said one or more control signals enable said remote intermediate television transmitter station to communicate said one or more first units of television programming to at least a first storage location and at least one of said one or more first codes or data and said one or more first units of television programming is transmitted at said specific time.

344. (Unchanged) The method of claim 343, wherein said one or more control signals enable said remote intermediate television transmitter station to communicate at least a first of said one or more first units of television programming from said at least a first storage location to a second storage location in said network, said method further comprising the step of embedding at least one of said one or more first codes or data in a signal containing said at least a first of said one or more first units of television programming.

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D42  
345. (Amended) The method of claim 342, wherein said one or more control signals enable said remote intermediate television transmitter station to store and communicate at least two said one or more first units of television programming at different times, said method further comprising the step of including in said one or more control signals at least one datum designating at least one designated time of said different times.

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346. (Unchanged) The method of claim 345, wherein said one or more control signals enable said remote intermediate television transmitter station to transmit at least a first of said one or more first units of television programming at said at least one designated time, said method further comprising the step of including data in said one or more control signals which operate at said remote intermediate transmitter station to perform at least one comparison prior to said at least one designated time.

347. (Unchanged) The method of claim 342, wherein said one or more control signals enable said controller or computer to control said one or more of said plurality of selective transfer devices based on at least one comparison with said one or more first codes or data, said method further comprising the step of including in said one or more control signals a second of said one or more first codes or data for comparison.

348. (Unchanged) The method of claim 347, wherein said remote intermediate television transmitter station is programmed to communicate to said controller or computer digital data received in one or more varying locations or timing patterns in an information transmission containing said one or more first units of television programming, said method further comprising the step of transmitting at least one of said one or more first codes or data and said one or more control signals in said one or more varying locations or timing patterns.

D43 349. (Amended) ~~The method of claim 348, [further comprising the step of transmitting in]~~ wherein a portion of said information transmission causes said one or more receiver stations to process a digital television signal.

350. (Unchanged) The method of claim 348, further comprising the step of transmitting in said one or more varying locations or timing patterns one or more instruct signals which operate to control said one or more receiver stations.

351. (Unchanged) The method of claim 342, wherein said remote intermediate television transmitter station is programmed to identify signals according to one or more varying patterns of composition, select at least identification signals, and communicate said selected at least identification signals to said controller or computer, said method further comprising the step of transmitting at least one of said one or more first codes or data in an identification signal pattern of composition.

D44  
352. (Amended) The method of claim 351, [further comprising the step of transmitting in] wherein a portion of said information transmission causes said one or more receiver station to process a digital television signal.

353. (Unchanged) The method of claim 351, wherein said one or more control signals program or reprogram said remote intermediate television transmitter station to identify said at least identification signals according to said identification signal pattern of composition, said method further comprising the step of including in said one or more control signals one or more second codes or data for comparison.

354. (Unchanged) The method of claim 351, further comprising the step of transmitting in said one or more varying patterns of composition one or more instruct signals which operate to control said one or more receiver stations.

355. (Unchanged) The method of claim 342, wherein said plurality of selective transfer devices include a switch and a storage device and said one or more

control signals include a first control signal which causes said switch to communicate said one or more first units of television programming to said storage device and a second control signal which causes said storage device to store said one or more first units of television programming.

356. (Unchanged) The method of claim 355, further comprising the step of transmitting a third control signal which causes said storage device to output said one or more first units of television programming and a fourth control signal which causes said switch to communicate said one or more first units of television programming to said broadcast or cablecast transmitter.

357. (Unchanged) The method of claim 356, wherein said first, second, third, and fourth control signals comprise a schedule.

358. (Unchanged) The method of claim 342, wherein said one or more of said plurality of selective transfer devices comprises a storage device and said one or more control signals include a first control signal which causes said storage device to store said one or more first units of television programming and a second control signal which causes said storage device to communicate said one or more first units of television programming to said broadcast or cablecast transmitter.

359. (Unchanged) The method of claim 342, wherein said one or more of said plurality of selective transfer devices include one or more switches and said one or more control signals cause said one or more switches to communicate said one or more first units of television programming from one of a plurality of sources to said broadcast or cablecast transmitter.

360. (Unchanged) The method of claim 359, wherein said plurality of sources include a plurality of storage locations.

361. (Unchanged) The method of claim 359, wherein said plurality of sources include a plurality of receivers, each said receiver capable of receiving said one or more first units of television programming from said one or more origination transmitters.

362. (Unchanged) The method of claim 359, wherein said plurality of sources include at least one storage device and at least one receiver capable of receiving said one or more first units of television programming from said one or more origination transmitters.

363. (Unchanged) The method of claim 342, wherein said one or more first units of television programming include a first unit of television programming and a second unit of television programming, said method further comprising the step of transmitting one or more second codes or data.

364. (Unchanged) The method of claim 363, wherein said remote intermediate television transmitter station determines when or how to communicate at least one of said first and second units of television programming based on said one or more second codes or data.

365. (Unchanged) The method of claim 364, wherein said remote intermediate television transmitter station compares said one or more first codes or data to said one or more second codes or data, said method further comprising the step of including said one or more second codes or data in said one or more control signals.

366. (Unchanged) The method of claim 364, wherein said one or more second codes or data designate said second unit of television programming and said remote intermediate television transmitter station determines when or how to communicate said second unit of television programming based on a comparison, said method further comprising the step of transmitting a plurality of second codes or data, at least a first of said plurality of second codes or data being in a signal containing said second unit of television programming, at least a second of said plurality of second codes or data being in said one or more control signals.

367. (Unchanged) The method of claim 366, further comprising the step of transmitting a plurality of said one or more first codes or data.

368. (Unchanged) The method of claim 364, wherein said one or more first codes or data designate said first unit of television programming and said remote intermediate television transmitter station determines when or how to communicate said first unit of television programming based on a comparison, said method further comprising the step of transmitting a plurality of first codes or data, at least a first of said plurality of first codes or data being in a signal containing said first unit of television programming, at least a second of said plurality of first codes or data being in said one or more control signals.

369. (Unchanged) The method of claim 342, wherein said remote intermediate television transmitter station is adapted to store and communicate a plurality of units of television programming based on a plurality of comparisons, said plurality of units of television programming including said one or more first units of television programming, said method further comprising the step of including in said one or more control signals a

plurality of second codes or data, each second code or datum designating one of said plurality of units of television programming.

370. (Unchanged) The method of claim 369, wherein said remote intermediate television transmitter station is adapted to identify said plurality of units of television programming, said method further comprising the steps of:

including in said one or more first codes or data a first identification of at least a first of said one or more first units of television programming; and

including in said plurality of second codes or data, said first identification and at least one other identification, said other identification to identify at least a second of said plurality of units of television programming.

371. (Unchanged) The method of claim 370, wherein said remote intermediate television transmitter station is adapted to locate a beginning or end of a unit of television programming stored at a memory, said method further comprising embedding a second identification in a signal containing said one or more first units of television programming having one or more first codes or data, said second identification to designate said beginning or end.

372. (Unchanged) The method of claim 342, wherein said remote intermediate television transmitter station is adapted to store and communicate a first plurality of units of television programming and to identify a second plurality of units of television programming, said method further comprising the steps of:

including in said one or more first codes or data a first identification; and

including in said one or more control signals at least one other identification, said other identification to identify at least one of said first plurality of units of television programming.

373. (Unchanged) The method of claim 372, wherein said remote intermediate television transmitter station is adapted to maintain one or more logs.

374. (Unchanged) The method of claim 342, wherein said remote intermediate television transmitter station is adapted to store and communicate a first plurality of units of television programming and to identify a second plurality of units of television programming, said method further comprising the step of including in said one or more control signals a first identification and a second identification, said first identification to identify at least a first of said one or more first units of television programming, said second identification to identify at least one of said first plurality of units of television programming.

375. (Unchanged) The method of claim 374, wherein said one or more control signals comprise a complete television programming transmission schedule in respect of said second plurality of units of television programming.

376. (Unchanged) The method of claim 374, wherein said remote intermediate television transmission station immediately retransmits said at least a first of said one or more first units of television programming, said method further including the step of transmitting from said one or more origination transmitters at least a second of said one or more first units of television programming, said at least a second of said one or more first units of television programming to be stored for delayed retransmission.

377. (Unchanged) The method of claim 374, wherein said one or more control signals comprise a complete television programming transmission schedule in respect of said first plurality of units of television programming.



378. (Unchanged) The method of claim 374, wherein said remote intermediate television transmitter station [is] maintains a complete programming transmission log in respect of said second plurality of units of television programming.

379. (Unchanged) A method of controlling a remote intermediate television transmitter station, said remote intermediate television transmitter station including a broadcast or cablecast transmitter for transmitting a plurality of units of television programming, one or more television receivers each operatively connected at least some of the time to said broadcast or cablecast transmitter for receiving one or more first units of television programming from one or more remote origination transmitter stations, one or more selective transfer devices each operatively connected at least some of the time to said broadcast or cablecast transmitter for communicating at least one of said plurality of units of television programming, a control signal processor, and a controller or computer capable of controlling said one or more selective transfer devices, said one or more selective transfer devices including a memory storing a signal containing one or more second units of television programming and one or more first codes or data to identify and control communication of said one or more second units of television programming; and with said remote intermediate television transmitter station adapted to process one or more control signals, to control the communication of one or more of said first and second units of television programming in response to said one or more control signals, and to deliver at said broadcast or cablecast transmitter said plurality of units of television programming, said method comprising the steps of:

(1) receiving one or more control signals which at said remote intermediate television transmitter station operates to control the communication of said plurality of units of television programming based on said one or more first codes or data; and

(2) transmitting said one or more control signals from said one or more origination transmitters before a specific time.

380. (Unchanged) A method for receiving, storing and displaying a plurality of messages at a television receiver station, said receiver station having a receiver section, a processor, a storage device and a user input device, said method comprising the steps of:

- receiving a signal at said receiver station receiver section;
- processing said signal to extract a message from said plurality of messages based on said step of receiving;
- storing said extracted message in a storage device; and
- displaying said extracted message on a television display in response to a user input at said user input device.

381. (Unchanged) The method of claim 380, further comprising the steps of:

- storing said plurality of messages;
- selecting said extracted message from said plurality of messages to display based on said user input.

382. (Unchanged) A method for receiving, assembling, and storing a message at a subscriber station, said subscriber station having a receiver section, a processor, a storage device and a controller, said method comprising the steps of:

- receiving a plurality of discrete signals at said subscriber station and inputting at least a portion of said plurality of discrete signals to said receiver station;
- processing said plurality of discrete signals to extract at least one message based on the step of receiving;
- storing said plurality of discrete signals in a storage device;

assembling said plurality of discrete signals into a signal comprising said at least one message; and

controlling said storage device to one of store said at least one message and communicate said at least one message.

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383. (Amended) A method of controlling a receiver station which includes a mass medium program receiver, a digital detector, at least one of a processor and a controller capable of processing data, said receiver station adapted to detect at least one message and is programmed to assemble a plurality of discrete signals, said method of controlling comprising the steps of:

[(1)] receiving mass medium programming and an instruct signal which is effective at the receiver station to at least one of extract and assemble said at least one message and delivering said mass medium programming and said instruct signal to a transmitter;

[(2)] receiving said at least one message and communicating said at least one message to a signal embedder;

[(3)] controlling said signal embedder to embed said at least one message in an information transmission in a pattern of said plurality of discrete signals, said pattern of said plurality of discrete signals having at least one of varying composition, varying timing, and varying location;

[(4)] communicating said information transmission to said transmitter; and

[(5)] transmitting said mass medium programming and said information transmission.

384. (Unchanged) The method of claim 383, wherein said at least one message includes an instruction.

385. (Unchanged) The method of claim 383, wherein said at least one message includes information, said information including at least one of audio, video, and data.

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Cont  
386. (Amended) A method of controlling receipt and processing at a receiver station of at least one identification signal; said receiver station including a receiver and a processor, said method comprising the steps of:

receiving said at least one identification signal that identifies specific signal content for at least one of a plurality of concurrent transmissions, wherein said plurality of concurrent transmissions comprises one of (i) a plurality of concurrent broadcast signal transmissions, (ii) a plurality of concurrent cablecast signal transmissions, and (iii) a plurality of concurrent broadcast and cablecast signal transmissions;

providing a comparison signal to said processor;

comparing said comparison signal to said at least one identification signal and generating a control signal identifying a desired signal transmission of said plurality of concurrent transmissions;

tuning the receiver, based on the generated control signal, to receive said desired signal transmission of said plurality of concurrent transmissions; and

performing one of:

responding to said control signal detected in said desired signal transmission, said control signal is operative to identify and communicate an electronic message;

selecting and storing at least one data received in said desired signal transmission, said at least one data comprising at least a portion of [said] an electronic message; and

controlling one of a receiver and a selective transmission device to communicate to one of a output device and a storage device [said] an electronic message received in said desired signal transmission.

D46  
Cmt

387. (Amended) A method of controlling a remote intermediate mass medium programming transmitter station to communicate mass medium program material to at least one receiver station, with said remote intermediate mass medium programming transmitter station including one of a broadcast transmitter and a cablecast transmitter for transmitting mass medium programming, a plurality of selective transfer devices each operatively connected to said one of a broadcast transmitter and a cablecast transmitter, a mass medium programming receiver, a control signal detector, and one of a controller and computer capable of controlling at least one of said plurality of selective transfer devices, said remote intermediate mass medium programming transmitter station adapted to detect at least one control signal, to control communication of said mass medium programming in response to said at least one control signal, and to deliver to said one of a broadcast transmitter and a cablecast transmitter said mass medium programming, said method comprising the steps of:

[(1)] receiving said mass medium programming to be transmitted by the remote intermediate mass medium programming transmitter station and delivering said mass medium programming to a transmitter, said mass medium programming is operative to identify and communicate an electronic message;

[(2)] receiving said at least one control signal at the remote intermediate mass medium programming transmitter station to control communication of said mass medium programming; and

[(3)] transmitting said at least one control signal to said transmitter before a specific time.

388. (Amended) The method of claim 387, wherein said at least one control signal includes one of a code and a datum which operates at [the] said remote intermediate mass medium programming transmitter station to identify said specific

programming of said mass medium programming, said method further comprising the step of:

transmitting a schedule which operates at the remote intermediate mass medium programming transmitter station to communicate said specific programming of said mass medium programming to a transmitter at said specific time.

389. (Amended) A method of processing signals at a receiver station to deliver a selected output to supplement mass medium programming, said receiver station having a processor, a storage device, and at least one output device, [with at least one of said at least one output device adapted to output said mass medium programming,] said method comprising the steps of:

[(1)] storing user data of interest;

[(2)] receiving said mass medium programming at said receiver station from a mass medium programming source and outputting [the] said mass medium programming to said at least one output device, said at least one output device adapted to output said mass medium programming;

[(3)] receiving one of a broadcast information transmission and a cablecast information transmission at said receiver station, said one of a broadcast information transmission and a cablecast information transmission including at least one instruct signal to direct said selected output to supplement said mass medium programming;

[(4)] detecting at least one instruct signal in said one of a broadcast information transmission and a cablecast information transmission and passing said detected at least one instruct signal to a processor; and

[(5)] controlling said processor based on said detected at least one instruct signal, said step of controlling comprising the steps of:

(a) identifying and communicating an electronic message to supplement said mass medium programming based on said stored user data of interest;

(b) directing said electronic message to supplement said mass medium programming to said at least one output device.

D4b  
Cmt.

390. (Amended) The method of claim 389, wherein said selected output is one of video, audio, text, and electronic data, said method further comprising one selected from the group consisting of:

[(1)] actuating one of a video output device, an audio output device, and a print output device, as appropriate, to output said selected output;

[(2)] decrypting at least a portion of said selected output; and

[(3)] controlling a selective transmission device to communicate said selected output to said output device.

391. (Amended) A method of controlling a plurality of receiver stations each of which includes a mass medium program receiver, a signal detector, at least one of a computer and processor, each said plurality of receiver stations adapted to detect at least one control signal and to input a viewer reaction to a specific offer communicated in a mass medium program, said method of controlling comprising the steps of:

[(1)] receiving one of a code and a datum at a transmitter station, wherein said one of a code and a datum designates one of (i) one of a product and a service offered in [one of] said mass medium program and (ii) said viewer reaction to said specific offer communicated in said mass medium program;

[(2)] receiving at least one control signal at said transmitter station, said at least one control signal operate to cause at least one receiver station of said plurality of receiver stations to identify and communicate an electronic message;

[(3)] transferring said one of a code [,] and a datum [,] and said at least one control signal to a transmitter at said transmitter station at a specific time; and

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Cmld.

~~[[4)]~~ transmitting said one of a code [,] and a datum [,] and said at least one control signal from said transmitter station.

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392. (Unchanged) A method of processing signals to control a mass medium programming presentation comprising the steps of:

receiving a programming signal containing mass medium programming;

communicating said programming signal containing said mass medium programming to a storage device and storing said programming signal containing said mass medium programming in said storage device;

receiving downloadable executable code which is effective at a user station to control one of a processor and computer to identify and communicate an electronic message;

communicating said downloadable executable code to said storage device; and

storing said downloadable executable code in said storage device which stores said programming signal containing said mass medium programming.

393. (Unchanged) A method of claim 392, wherein said mass medium programming comprises one of video, audio, and text, and method further comprising one of the steps of:

embedding said downloadable executable code in one of a television signal and a radio signal;

embedding a code in a signal including said mass medium programming that enables said one of a processor and computer to one of receive information and output information to supplement said mass medium programming in accordance with said downloadable executable code;



communicating a program unit identification code to said storage device and storing said program unit identification code in said storage which stores said mass medium programming;

communicating to said storage device and storing in said storage device information to be processed at a user station to evidence one of an availability, use, and usage of one of video, audio, and text associated with said mass medium programming;

storing in said storage device an instruct signal which is effective at said user station to select said mass medium programming.

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Cmt.  
394. (Amended) The method of claim 392, said method further comprising the steps of selecting one of:

a datum that identifies a unit of computer software in said programming signal;

[a datum that specifies some of a way to instruct receiver end equipment what specific programming to select to play or record other than that immediately at hand, how to load it on player or recorder equipment, when and how to play it or record it other than immediately, how to modify it, what equipment or channel or channels to transmit it on, when to transmit it, and how and where to file it or refile it or dispose of it;]

a datum that designates an addressed apparatus;

[a datum that specifies one of where, when, and how to locate a signal;

a datum that informs a processor of a fashion for identifying and processing a signal;]

a datum that is part of a decryption code;

a comparison datum that designates a communication schedule; and embedding a selected one of said programming signal.

395. (Amended) The method of claim 392, further comprising the steps of: selected a second instruction, said second instruction being one of:

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Cmt,

a switch control instruction;  
a timing control instruction;  
a locating control signal;  
an instruct-to-contact signal that designates a remote receiver station;  
an instruct-to-transfer signal that designates one of a unit of broadcast programming and a unit of cablecast programming;  
an instruct-to-delay signal that designates said one of a unit of broadcast programming and a unit of cablecast programming;  
one of an instruct-to-decrypt and an instruct-to-interrupt signal that designates a unit of programming and a way to one of decrypt and interrupt;  
one of an instruct-to-enable and an instruct-to-disable signal that designates an apparatus;  
an instruct-to-record signal that designates one of a broadcast program and a cablecast program;  
an instruction signal that controls a multimedia presentation;  
an instruction signal that governs one of a broadcast receiver station environment and a cablecast receiver station environment;  
an instruct-to-power-on signal that designates a receiver;  
an instruct-to-tune signal that designates one of a receiver and a frequency;  
an instruct-to-coordinate signal that designates two apparatus;  
an instruct-to-compare signal that designates one of a news transmission and a computer input;  
an identifier signal that causes a computer to instruct a plurality of tuners each to tune to a broadcast or cablecast transmission;  
an instruct-to-coordinate signal that designates two units of multimedia information and one of: (1) an output time and (2) an output place;  
an instruct-to-generate signal that designates output datum;

D47  
Amended

an instruct-to-transmit signal that designates a computer output;  
an instruct-to-overlay signal that designates a television image;  
an instruct-that-if signal that designates a function to perform if a predetermined condition exists;  
an instruct-to-enable-and-deliver signal that designates information that supplements a television program;  
an instruct-to-transmit signal that designates a computer peripheral [storage] device;  
a code signal that designates a datum to one of remove and embed; and  
a signal addressed to a receiver station apparatus; and  
embedding said selected second instruction in said programming signal.

396. (Amended) A method of communicating program material to at least one receiver station each includes one of a broadcast program receiver and a cablecast program receiver, an output device, a control signal detector, a processor operably connected to said output device, said at least one receiver station adapted to detect and respond to at least one instruct signal, said method of communicating comprising the steps of:

- [(1)] receiving a program to be transmitted at a transmitter station and delivering said program to a transmitter;
- [(2)] receiving and storing said at least one instruct signal at said transmitter station, said at least one instruct signal at [the] said receiver station operate to identify and communicate an electronic message;
- [(3)] transferring said at least one instruct signal to a transmitter; and
- [(4)] transmitting from said transmitter station an information transmission comprising said program and said at least one instruct signal.

397. (Unchanged) The method of claim 396, wherein a controller controls a switch to communicate to a transmitter one of a selected mass medium program and an instruct signal, further comprising one of the steps of:

- detecting a signal which is effective at the transmitter station to instruct transmission;

- inputting to said controller a signal which is effective to control said switch;

- controlling said switch to communicate one of said program and said at least one instruct signal according to a transmission schedule;

- controlling said switch to communicate said program from a specific one of a plurality of program input receivers; and

- controlling said switch to communicate one of said program and said at least one instruct signal to a selected one of a plurality of transmitters.

398. (Unchanged) A method for receiving, assembling, and storing at a subscriber station, said subscriber station having a receiver section, a processor, a storage device and a controller, said method comprising the steps of:

- receiving a plurality of discrete signals at said subscriber station and inputting at least a portion of said plurality of discrete signals to said receiver section;

- processing said plurality of discrete signals to extract at least one message based on the step of receiving;

- storing said plurality of discrete signals in a storage device;

- assembling said plurality of discrete signals into a signal comprising said at least one message; and

- controlling said subscriber station in accordance with said signal of said discrete signals based on the step of assembling.

D48  
399. (Amended) A method of controlling a receiver station which includes a mass medium program receiver, a digital detector, at least one of a processor and a controller capable of processing data, said receiver station adapted to detect at least one at least one control signal and is programmed to assemble a plurality of discrete signals, said method of controlling comprising the steps of:

[(1)] receiving mass medium programming and an instruct signal which is effective at the receiver station to at least one of extract and assemble said at least one control signal and delivering said mass medium programming and said instruct signal to a transmitter;

[(2)] receiving said at least one control signal and communicating said at least one control signal to a signal embedder;

[(3)] controlling said signal embedder to embed said at least one control signal message in an information transmission in a pattern of said plurality of discrete signals, said pattern of said plurality of discrete signals having at least one of varying composition, varying timing, and varying location;

[(4)] communicating said information transmission to said transmitter; and

[(5)] transmitting said mass medium programming and said information transmission.

## II. REMARKS

### A. Introduction

Applicants have carefully reviewed the Office Action originally issued on March 30, 2000 and have made the foregoing amendments in response thereto.